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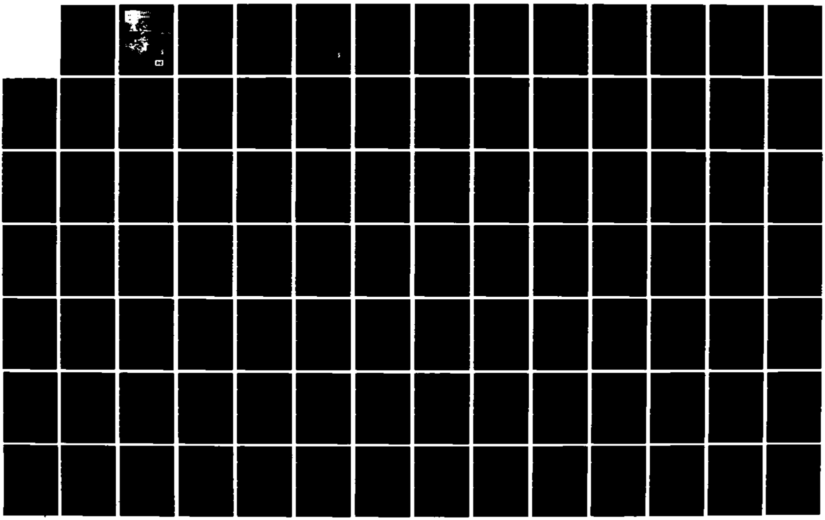

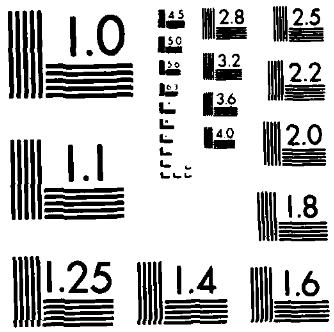

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Water Quality Management Studies

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ALABAMA RIVER

R.E. "BOB" WOODRUFF, WILLIAM "BILL" DANNELLY AND CLAIBORNE LAKES

AUGUST - DECEMBER 1977

U.S. ARMY CORPS OF ENGINEERS
MOBILE DISTRICT

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20. ABSTRACT (Continue on reverse side if necessary and identify by block number)

Water, sediment, and biological samples were collected at 3-week intervals from 46 stations on the Alabama and Coosa Rivers between August 8 and December 8, 1977. Seventeen stations were located in Jones Bluff Reservoir (river miles 0.5 to 4.4 on the Coosa River and river miles 302.0 to 236.4 on the Alabama River); 17 were situated in William "Bill" Dannelly Reservoir (river miles 236.4 to 132.8); 9 were located in Claiborne Reservoir (river miles 132.8 to 72.7); and 3 were located below Claiborne Reservoir (river miles 72.7 to 58.9). The samples were transported to the laboratory where they were analyzed according to

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WATER QUALITY MANAGEMENT STUDIES
ALABAMA RIVER
R. E. "BOB" WOODRUFF, WILLIAM "BILL" DANNELLY AND CLAIBORNE LAKES
August-December 1977

Prepared under Contract No. DACW01-77-C-0140

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March 1983

EXPLANATORY NOTE

Throughout this report R. E. "Bob" Woodruff Lake is referred to as Jones Bluff Reservoir. Additionally, in late 1982, the name of Jones Bluff Lock and Dam was changed to Robert F. Henry Lock and Dam.

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ABSTRACT

Water, sediment, and biological samples were collected at 3-week intervals from 46 stations on the Alabama and Coosa Rivers between August 8 and December 8, 1977. Seventeen stations were located in Jones Bluff Reservoir (river miles 0.5 to 4.4 on the Coosa River and river miles 302.0 to 236.4 on the Alabama River); 17 were situated in William "Bill" Dannelly Reservoir (river miles 236.4 to 132.8); 9 were located in Claiborne Reservoir (river miles 132.8 to 72.7); and 3 were located below Claiborne Reservoir (river miles 72.7 to 58.9). The samples were transported to the laboratory where they were analyzed according to accepted EPA procedures. The water samples were analyzed for 39 water-quality parameters, including nutrients, physical characteristics, heavy metals, bacterial populations, and chlorophylls *a*, *b* and *c*. Sediments were tested for the presence of heavy metals and pesticides. Mechanical analysis was also performed on the sediment samples. Biological sampling included plankton, benthic macroinvertebrate, and macrophyte communities. The resulting data were tabulated and selected parameters plotted according to concentration, or organism number per unit area, versus distance, with significant discharges noted. Measured parameters were placed on the U.S. EPA STORET computer system.

I. INTRODUCTION

Performance of a water-quality management study of reservoirs on the Alabama River for the U.S. Army Corps of Engineers began in July 1977. Water-quality, sediment and biological data were collected at 46 sampling sites on the Coosa and Alabama River systems from river mile 11.2 on the Coosa River at Wetumpka, Alabama, 263 river miles southwesterly to approximately 16 river miles below Claiborne Lock and Dam, Claiborne, Alabama.

The Coosa River originates at Rome, Georgia, in northwest Georgia at the junction of the Oostanaula and Etowah Rivers, which have their sources in southeastern Tennessee and northern Georgia (fig. 1). From Rome, the Coosa River flows 286 miles southwesterly through Georgia and into east-central Alabama where it unites with the Tallapoosa River 18 miles above Montgomery, Alabama, to form the Alabama River. The Alabama River flows 318 miles southwesterly to the northeastern corner of Mobile County where it joins the lower Tombigbee River. The total drainage area of the Alabama River in Alabama, Georgia and Tennessee is 22,500 square miles (U.S. Army Corps of Engineers, 1976a).

The three reservoirs included in this study area are Jones Bluff, William "Bill" Dannelly (Millers Ferry Lock and Dam), and Claiborne (figs. 2, 3, and 4, respectively).

The Jones Bluff Lock and Dam, located at navigation mile 236.13, consists of earthen dikes and a power plant on the west (right) bank. The 88-mile-long reservoir has a surface area of 12,300 acres at normal pool elevation of 125.0 feet and a total capacity of 234,200 acre-feet. The estimated average flow of the river for the period 1929-70 was 25,100 cubic feet per second (cfs), and the estimated 7-day low flow was 5,330 cfs. The maximum monthly flow in the period of record was 149,000 cfs (U.S. Geological Survey, 1977); the minimum daily flow was 3,340 cfs (U.S. Geological Survey, 1977).

The Millers Ferry Lock and Dam, located at river mile 132.98, forms the 103-mile-long William "Bill" Dannelly Reservoir, which has a surface area of 17,200 acres at normal pool elevation of 80.0 feet and a total capacity of 331,800 acre-feet. This lock and dam is a multiple-purpose structure (for navigation, flood control, and power generation). The maximum monthly flow for the period 1937-66 was 155,200 cfs (U.S. Army Corps of Engineers, 1976b); the minimum daily flow in the period was 3,700 cfs.

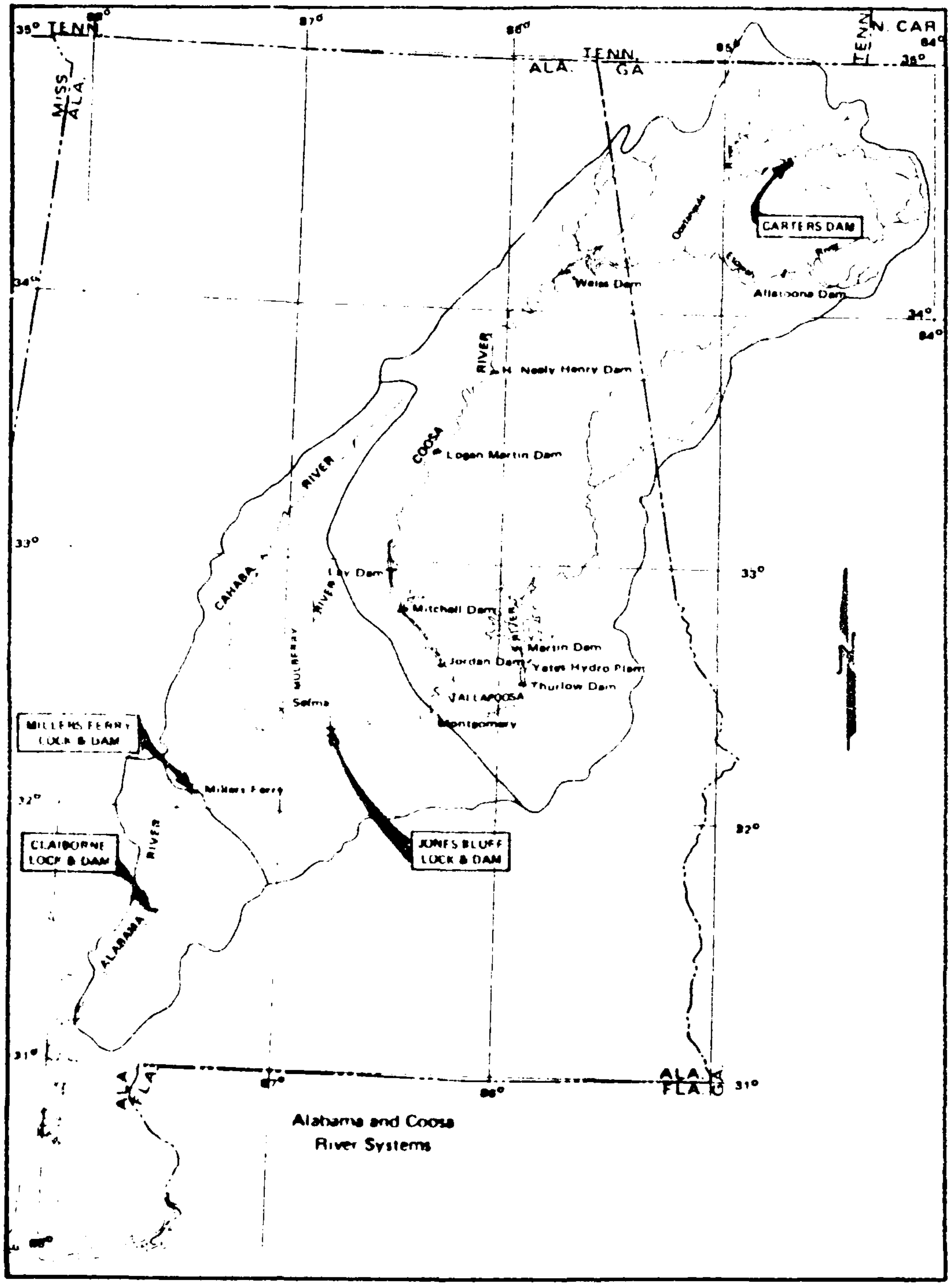

Figure 1.--Map of Alabama and Coosa River systems.

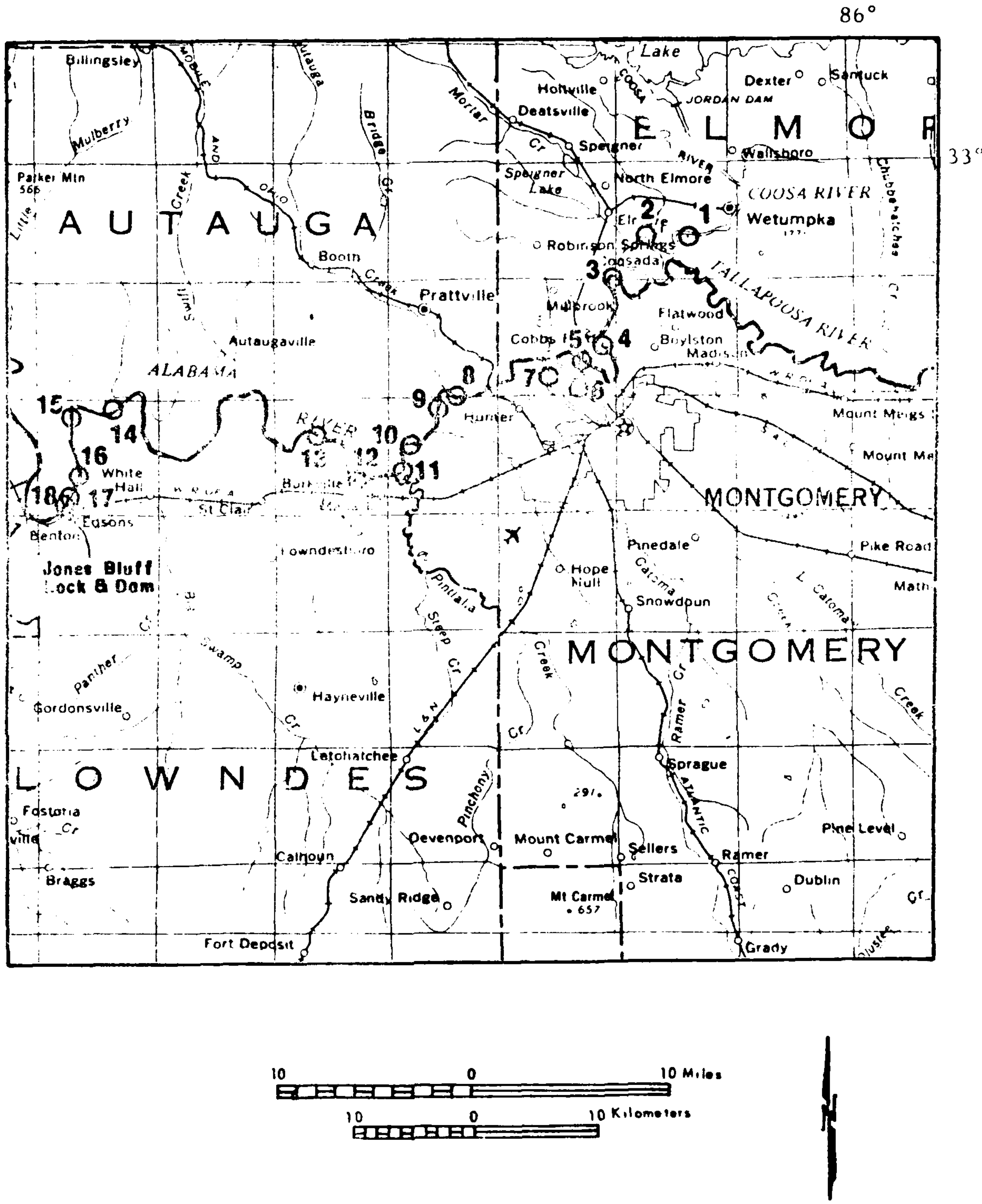

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Figure 2.--Sampling stations above and below Jones Bluff Lock and Dam on the Alabama and Coosa Rivers.

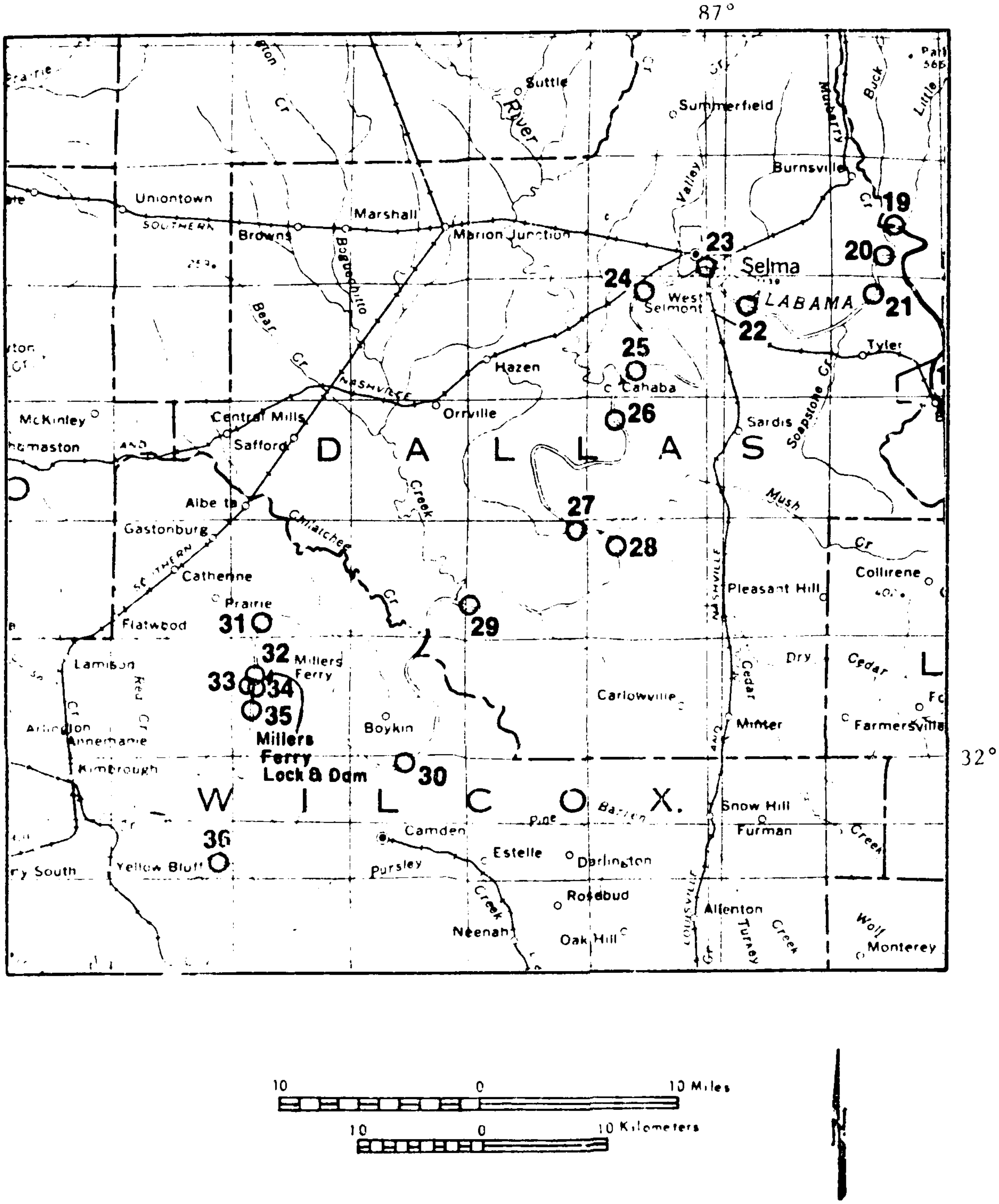

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Figure 3. -Sampling stations above and below Millers Ferry Lock and Dam on the Alabama River.

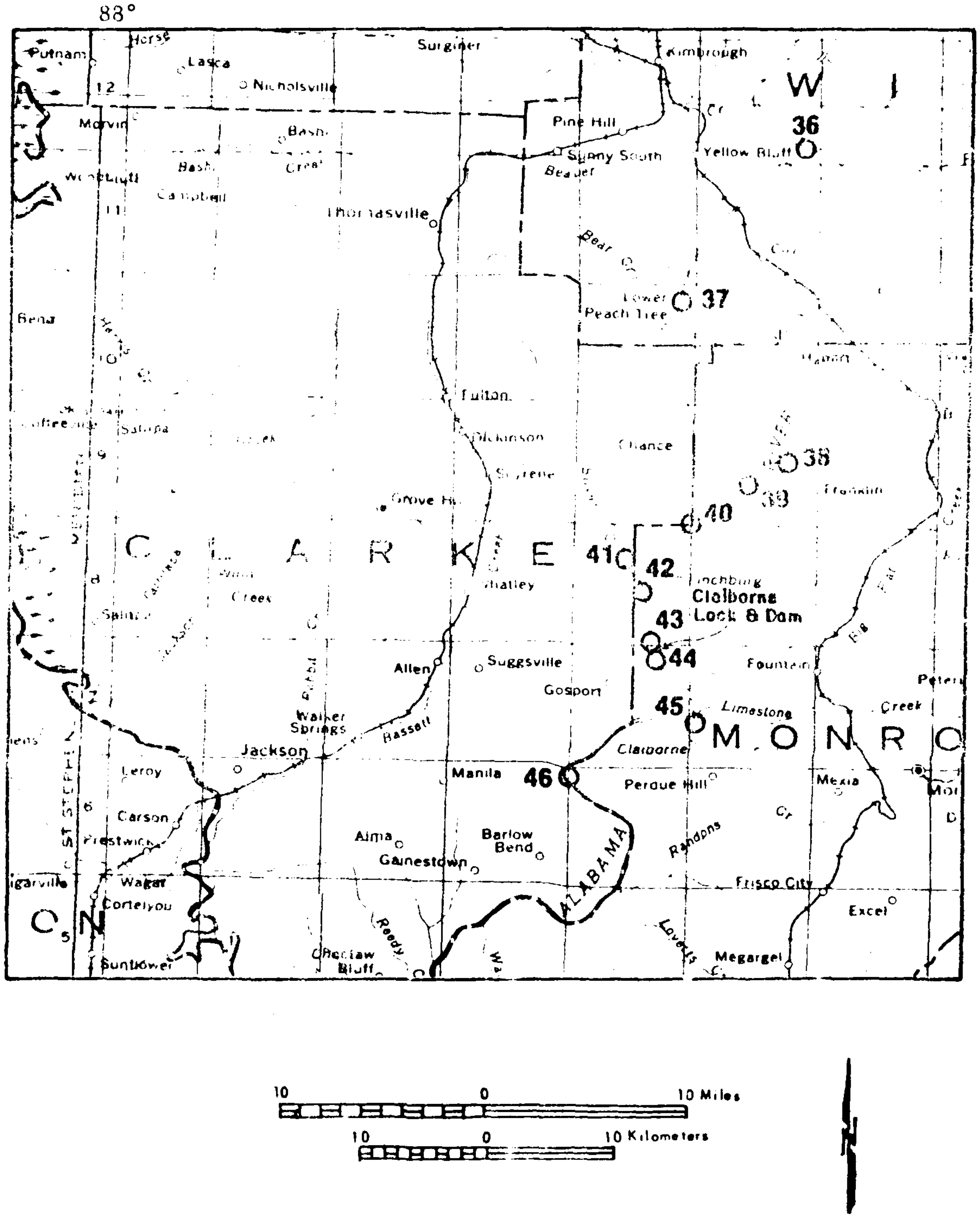

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Figure 4.--Sampling stations above and below Claiborne Lock and Dam on the Alabama River.

Claiborne Lock and Dam is located 72.5 navigation miles above the mouth of the Alabama River near the small town of Claiborne and forms Claiborne Lake. The 60-mile-long reservoir has a surface area of 3,850 acres at normal pool elevation of 35 feet and a volume of 93,360 acre-feet. The Claiborne Lock and Dam is primarily a navigation structure. The maximum monthly flow at the dam for the period 1931-69 was 165,100 cfs (U.S. Army Corps of Engineers, 1976b); the minimum daily flow was 4,840 cfs (U.S. Geological Survey, 1978).

II. OBJECTIVES

The objectives of the study as stated in the U.S. Army Corps of Engineers contract with the Alabama Geological Survey were as follows:

A. Establish base-line conditions and monitor subsequent changes;
B. Identify water quality-environmental problems;
C. Provide continuing guidance to reservoir regulation elements for effective control of reservoirs and discharge water quality-environmental conditions;
D. Study special problems or develop criteria for such solutions as structural modification or modification of reservoir regulation procedures aimed at controlling or enhancing environmental conditions and meeting water quality objectives; and,
E. Provide an adequate data base and understanding of project conditions to facilitate coordination with state agencies in regard to implementing watershed pollution control.

III. MATERIALS AND METHODS

A. General

Water, sediment, and biological samples were collected at 3-week intervals from 46 Alabama-Coosa River stations between August 9 and December 8, 1977. A list of station numbers, U.S. Environmental Protection Agency (EPA) STORET station numbers and locality data for each station are given in table 1. The collection schedule and parameter list for the study period are shown in table 2.

Water, sediment, and biological samples were analyzed by the Geochemical-Water Quality Research Division of the Geological Survey of Alabama. Methods and techniques of analysis used during the course of this study are presented in this section.

B. Chemical

1. Sampling Methods

Water samples were collected with a 2-gallon glass bottle supported by a metal cage during run 1 (August 9-25, 1977) and a Kemmerer 1.2-liter (l) plastic sampler during runs 2 through 6 (August 29 through December 8, 1977) and were preserved according to approved E.P.A. procedures (table 3). All water samples except those for chlorophylls *a*, *b* and *c*, five-day biochemical oxygen demand (BOD_5), pesticides, carotenoids, bacteria, algal growth potential (AGP), and total organic carbon (TOC) were collected with the 1.2-l Kemmerer sampler at midstream approximately 5 feet below the water's surface or at mid-depth where the depth was less than 10 feet. Water samples for chlorophylls *a*, *b* and *c*, BOD_5, pesticides, carotenoids, and TOC were collected with the aforementioned 2-gallon glass bottle. All samples were immediately chilled except those for chlorophylls *a*, *b* and *c*, which were filtered (500 milliliters) with a .45-micron Millipore membrane paper. This paper and the filtrate were placed in a petri dish, chilled, and transported (within an 8-hour period) to the laboratory where the residue was frozen until analysis.

Bacteriological samples were collected 1 foot below the water's surface in sterile BOD bottles.

Table 1.--Identification of sampling stations on the Alabama and Coosa Rivers

Station number	STORET identification number	Location	River mile
1	02411605	Coosa River near Montgomery, Alabama	6.4
2	02419965	Coosa River below Mortar Creek near Elmore, Alabama	4.4
3	02419980	Alabama River at Coosada Ferry near Montgomery, Alabama	302.0
4	02419983	Alabama River near Chisolm, Alabama	298.1
5	02419986	Alabama River at L&N Railroad near Millbrook, Alabama	29[illegible].2
6	02419987	Alabama River at Alabama highway 143 near Montgomery, Alabama	288.2
7	02419989	Alabama River near Maxwell Air Force Base near Montgomery, Alabama	282.[illegible]
8	02420045	Alabam River near Prattville, Alabama	277.6
9	02420600	Alabama River below Autauga Creek, Prattville, Alabama	274.2
10	02421060	Alabama River below Catoma Creek near Prattville, Alabama	271.7
11	02421090	Alabama River above Pintlalla Creek near Prattville, Alabama	269.8
12	02421195	Alabama River near Burkville, Alabama	26[illegible].1
13	024212[illegible]0	Alabama River below Rocky Branch near Lowndesboro, Alabama	260.3
14	02421290	Alabama River below Beaver Creek near Autaugaville, Alabama	244.7
15	02421315	Alabama River below Ivy Creek near Mulberry, Alabama	240.7
16	02421325	Alabama River at Days Bend near Benton Alabama	238.7
17	02421349	Jones Bluff Reservoir (Alabama River) near Benton, Alabama	236.4
18	02421355	Alabama River near Benton, Alabama	236.0
19	02422170	Alabama River near Statesville, Alabama	223.8
20	02422625	Alabama River below Mulberry Creek near Burnsville, Alabama	220.0
21	02422650	Alabama River near Manila, Alabama	215.5
22	02422765	Alabama River near Craig Air Force Base near Selma, Alabama	211.7
23	02423000	Alabama River at Selma, Alabama	207.4

Table 1.--Continued

Station number	STORET identification number	Location	River mile
24	02423050	Alabama River near Selma, Alabama	200.5
25	02423090	Alabama River above Cahaba River near Cahaba, Alabama	189.5
26	02425115	Alabama River near Cahaba, Alabama	185.4
27	02425250	Alabama River above Cedar Creek near Belknap, Alabama	173.2
28	02425700	Alabama River near Elm Bluff, Alabama	171.1
29	02425800	Alabama River above Bogue Chitto Creek	162.2
30	02427400	Alabama River near Camden, Alabama	146.5
31	02427470	Alabama River near Catherine, Alabama	136.7
32	02427500	Alabama River near Millers Ferry, Alabama	133.9
33	02427504	William "Bill" Dannelly Reservoir (Alabama River) near Camden, Alabama	133.2
34	02427507	Alabama River above Powerhouse at Millers Ferry Lock and Dam	132.8
35	02427511	Alabama River near Midway, Alabama	132.3
36	02427745	Alabama River near Yellow Bluff, Alabama	118.4
37	02428200	Alabama River at Lower Peachtree, Alabama	98.8
38	02428335	Alabama River above McLeod Creek near Franklin, Alabama	86.5
39	02428345	Alabama River at Davis Ferry near Franklin, Alabama	84.6
40	02428380	Alabama River below Cane Creek near Chance, Alabama	80.5
41	02428395	Silver Creek near Finchburg, Alabama	76.2
42	02428396	Alabama River below Silver Creek near Finchburg, Alabama	75.0
43	02428399	Claiborne Reservoir (Alabama River) near Claiborne, Alabama	72.7
44	02428405	Alabama River 0.4 mile below Claiborne Lock and Dam	72.4
45	02429500	Alabama River at Claiborne, Alabama	66.9
46	02429506	Alabama River at Cedar Creek near Gosport, Alabama	58.9

Table 2.--Collection periods for the six sampling runs on the Alabama-Coosa Rivers from August 9 through December 8, 1977

Parameter	Collection Periods					
Water Quality	8/9-8/25	8/29-9/14	9/19-10/4	10/11-10/25	10/31-11/17	11/21-12/8
Hydrogen ion (pH)	x	x	x	x	x	x
Temperature	x	x	x	x	x	x
Conductivity	x	x	x	x	x	x
Oxidation reduction potential (ORP)	x	x	x	x	x	x
Color (apparent)	x	x	x	x	x	x
Hardness	x	x	x	x	x	x
Chloride	x	x	x	x	x	x
Alkalinity as $CaCO_3$	x	x	x	x	x	x
Calcium, total	x	x	x	x	x	x
Dissolved silica	x	x	x	x	x	x
Total iron (Fe)	x	x	x	x	x	x
Dissolved Fe	x	x	x	x	x	x
Total organic carbon (TOC)	x	x	x	x	x	x
Total Kjeldahl nitrogen (TKN)	x	x	x	x	x	x
Nitrite (NO_2) + Nitrate (NO_3) as Nitrogen (N)	x	x	x	x	x	x
Ammonia (NH_3) as N	x	x	x	x	x	x
Total phosphate (PO_4) as P	x	x	x	x	x	x
Ortho PO_4, dissolved, as P	x	x	x	x	x	x
Sulphate, dissolved	x	x	x	x	x	x
Total coliform	x	x	x	x	x	x
Fecal coliform	x	x	x	x	x	x
Fecal streptococci	x	x	x	x	x	x
Dissolved oxygen	x	x	x	x	x	x
Biochemical oxygen demand--5 day (BOD_5)	x	x	x	x	x	x
Chemical oxygen demand (COD)	x				x	
Solids, residue filterable (dissolved)	x	x	x	x	x	x
Solids, residue non-filterable (suspended)	x	x	x	x	x	x
Turbidity	x	x	x	x	x	x
Chlorophyll *a*, uncorrected	x	x	x	x	x	x
Chlorophyll *b*	x	x	x	x	x	x
Chlorophyll *c*	x	x	x	x	x	x
Dissolved manganese	x	x	x	x	x	x

Table 2.--Continued

Parameter	Collection Periods					
Water Quality	8/9-8/25	8/29-9/14	9/19-10/4	10/11-10/25	10/31-11/17	11/21-12/8
Total carotenoids	x	x	x	x	x	x
Secchi disc				x	x	x
Algal growth potential		x				
Polychlorinated biphenyls (PCB) (AR 1242)		x				
PCB (AR 1254)		x				
PCB (AR 1260)		x				
Manganese, total	x	x	x	x	x	x
Sediment						
Volatile solids		x				
TOC		x				
COD		x				
Oil and grease		x				
Total PO_4		x				
Phosphorus soluble		x				
NH_3 as N		x				
NO_2 + NO_3 as N		x				
Copper, total		x				
Iron, total		x				
Lead, total		x				
Manganese, total		x				
Magnesium, total		x				
Mercury, total		x				
Zinc, total		x				
Cadmium, total		x				
Arsenic, total		x				
Chromium, total		x				
Nickel, total		x				
Hexachlorocyclohexane (BHC)		x				
Lindane		x				
Heptachlor		x				
Aldrin		x				
Endosulfan		x				
1,1-Dichloro-2,2-bis (p-chlorophenyl) ethylene (DDE)		x				
Dieldrin		x				

Table 2.--Continued

Parameter	Collection Periods					
Sediment	8/9-8/25	8/29-9/14	9/19-10/4	10/11-10/25	10/31-11/17	11/[illegible]-12/[illegible]
Endrin		x				
2,2-bis (chlorophenyl)-1,1-dichloroethane compound. (DDD)		x				
Dichloro diphenyl trichloroethane (DDT)		x				
Mirex		x				
Methoxychlor		x				
2,2-dichlorovinyl dimethyl phosphate (DDVP)		x				
Ph[illegible]n		x				
Phorate		x				
Diazinon		x				
Disulfoton		x				
Methyl parathion		x				
Ronnel		x				
Malathion		x				
Parathion		x				
S,S,S-tributyl ester phosphorotrithioic acid (DEF)		x				
Ethion		x				
Chlordane		x				
Toxophene		x				
Guthion		x				
PCB (AR 1242)		x				
PCB (AR 1254)		x				
PCB (AR 1260)		x				
Mechanical analyses		x				
Biological						
Benthos						
Hester-Dendy	x		x			
Ponar	x		x		x	
Plankton	x		x		x	
Macro vegetation			x			

Table 3.--Preservatives, holding times, and sampling containers for the water-quality parameters

Measurement	Container	Preservative	Holding time
Alkalinity	[1]Plastic	[2]	24 hours
BOD_5	Glass, sterile	Cool, 4°C	6 hours
COD	Plastic	H_2SO_4 to pH 2	7 days
Chloride	Plastic	None required	7 days
Color (apparent)	Plastic	[2]	24 hours
Dissolved oxygen[2]	--	--	No holding
Hardness	Plastic	Cool, 4°C	7 days
Metals, dissolved (Mn, Fe)	Plastic	Filtered on site, HNO_3 to pH 2	6 months
Metals, total (Mn, Fe)	Plastic	HNO_3 to pH 2	6 months
Ammonia	Plastic	Cool, 4°C, H_2SO_4 to pH 2	24 hours
Kjeldahl, nitrogen	Plastic	Cool, 4°C, H_2SO_4 to pH 2	24 hours
Nitrate + nitrite	Plastic	Cool, 4°C, H_2SO_4 to pH 2	24 hours
Organic carbon	Plastic	Cool, 4°C, H_2SO_4 to pH 2	24 hours
pH[2]	--	--	No holding
Ortho-phosphate, dissolved	Plastic	Filtered on site, Cool, 4°C	24 hours
Total phosphorus	Plastic	Cool, 4°C	24 hours
Residue, filterable	Plastic	Cool, 4°C	7 days
Residue, nonfilterable	Plastic	Cool, 4°C	7 days
Specific conductance[2]	--	--	No holding
Sulfate	Plastic	Cool, 4°C	7 days
Turbidity	Plastic	Cool, 4°C	7 days
Oxidation reduction potential[2]	--	--	No holding
Silica, dissolved	Plastic	Filtered on site, Cool, 4°C	7 days
Total coliform	Glass, sterile	Cool, 4°C	8 hours
Fecal coliform	Glass, sterile	Cool, 4°C	8 hours
Streptococci	Glass, sterile	Cool, 4°C	8 hours
Chlorophylls a, b, c	Glass	Cool, 4°C	24 hours
Carotenoids	Glass	Cool, 4°C	24 hours
Algal growth potential	Glass	Cool, 4°C	3 days
PCB (AR 1242)	Glass, with Teflon-lined lid	Cool, 4°C	6 months
PCB (AR 1254)	Glass, with Teflon-lined lid	Cool, 4°C	6 months
PCB (AR 1260)	Glass, with Teflon-lined lid	Cool, 4°C	6 months

[1]Polyethylene plastic container
[2]Determined in situ

Midstream bottom-sediment samples for heavy metals, pesticides, and mechanical analyses were collected utilizing a 9-inch by 9-inch epoxy-coated Ponar dredge sampler. Each sample was placed in a 1-quart glass Mason jar with a teflon-lined cap and chilled to 4 degrees Celsius (°C). These samples were transported to the laboratory daily and kept under refrigeration until analysis.

2. Analytical Methods

Water-quality and sediment parameters tested, associated EPA STORET codes, and test procedures used throughout the project are given in table 4.

3. Quality Control

The Water-Quality Research Division of the Geological Survey of Alabama (GSA) coordinated the quality control in this study with the U.S. Army Corps of Engineers' South Atlantic Division (SAD) Laboratory at Marietta, Georgia, and also with the office of the Mobile District Corps of Engineers. Field meters for detection of dissolved oxygen, conductance, pH, and oxidation reduction potential were calibrated at each sampling station with standard solutions in accordance with EPA calibration procedures. A laboratory quality assurance plan was sent to both offices and approved prior to field collection of samples. In addition to this quality control plan, another program was coordinated with the U.S. Geological Survey (USGS), Water Resources Division in Denver, Colorado. In this standard reference program, an unknown sample was received and analyzed in October 1977. A total of 39 parameters (including trace metals, nutrients, and physical-chemical constituents) was determined as part of participation in this program. In this study, there were no rejected values and none of the GSA laboratory sample results exceeded one standard deviation from the mean concentration of results from 50 participating private, state, and federal laboratories.

C. Biological

1. Plankton

Plankton samples (phytoplankton and zooplankton) were collected with a Wisconsin-style plankton net having a 5-inch-diameter mouth, a Nitex net throat with 80-micron apertures, and a brass bucket containing 9 square inches of filter net. Owing to the rapid flow of the Alabama River, a strictly vertical tow could not be made at any of the stations. Therefore, net samples were taken with an arbitrary tow of 40 feet. The beginning tow depth using this method varied from 20 to 35 feet.

Table 4.--Water-quality and sediment parameters, standard units of measurement, U.S. EPA STORET numbers, and methods of analysis employed during the Alabama-Coosa River study in 1977

Parameter	Method	STORET number	Reference
Water quality			
Alkalinity as $CaCO_3$ mg/l	Titration electrometric	00410	EPA,[1] 1974 (precision data), p. 3
BOD 5-day, mg/l	Probe method	00310	APHA,[2] 1975, p. 489
Oxygen dissolved, mg/l	Membrane electrode	00299	EPA, 1974, p. 51
Chemical oxygen demand (COD), mg/l	Dichromate reflux		APHA, 1975, p. 495
Total solids, mg/l	Gravimetric 103-105°C		APHA, 1975, p. 535
Temperature (°C)	Thermistor probe	00010	APHA, 1975, p. 125
Total dissolved (filterable) solids, mg/l	Glass fiber filtration 180°C	70300	EPA, 1974, p. 266
pH, units	Potentiometric	00400	EPA, 1974, p. 239
Total suspended (non-filterable), solids, mg/l	Glass fiber filtration 103-105°C	70299	APHA, 1975, p. 537
Total volatile solids, mg/l	Gravimetric 550°C		APHA, 1975, p. 536
Oxidation reduction potential (mv)	Electrometric	00090	
Ammonia (as N), total, mg/l (NH_3 + NH_4 - N)	Distillation-nesslerization or titration automated phenolate	00610	EPA, 1974, p. 134
Kjeldahl nitrogen (as N), mg/l	Digestion + distillation - nesslerization	00625	APHA, 1975, p. 469; EPA, 1974, p. 149
Nitrate-nitrite (as N), total, mg/l	Cadmium or hydrazine reduction	00630	EPA, 1974, p. 207
Total phosphorus (as P), mg/l	Persulfate digestion and automated single reagent	00665	APHA, p. 526; ASTM,[3] 1977, p. 42; EPA, 1974, p. 246 and 259
Ortho-phosphorus, mg/l	Phosphomolybdate	00671	EPA, 1974, p. 256

[1]U.S. Environmental Protection Agency
[2]American Public Health Association
[3]American Society for Testing and Materials

Table 4.--Continued

Parameter	Method	STORET number	Reference
Water quality (cont'd)			
Total organic carbon (TOC), mg/l	Combustion-infrared	00680	EPA, 1974, p. 221
Hardness, total, $CaCO_3$ mg/l	Calculation	00900	EPA, 1974, p. 78
Calcium, dissolved, mg/l	EDTA titration; or atomic absorption	00915	EPA, 1974, p. 102
Iron, total, µg/l	Atomic absorption	01045	EPA, 1974, p. 108
Iron, dissolved, µg/l	Atomic absorption	01046	EPA, 1974, p. 108
Magnesium, total, mg/l	Atomic absorption	00925	EPA, 1974, p. 112
Manganese, dissolved, µg/l	Atomic absorption (chelation extraction)	01056	EPA, 1974, p. 114
Manganese, total, µg/l	Atomic absorption	01055	EPA, 1974, p. 114
Silica, mg/l	Atomic absorption, direct	00955	EPA, 1974, p. 274
Sulfate (as SO_4), mg/l	Thorin	00946	EPA, 1974, p. 286 and p. 288
Chloride, mg/l	Mercuric nitrate	00940	EPA, 1974, p. 29
Color, platinum-cobalt units	Colorimetric	00080	EPA, 1974, p. 39
Specific conductance, µmho/cm at 25°C	Wheatstone bridge	00095	EPA, 1974, p. 284
Turbidity, NTU	Turbidimeter Nephelometric determination	00076	APHA, 1975, p. 350 and p. 689
Fecal streptococci, bacteria number per 100 ml	Membrane filter, plate count, MF-KF, Agar	31673	APHA, 1975, p. 690
Coliform bacteria (fecal), number per 100 ml	MFM, FC Broth; membrane filter	31616	Greeson, 1977, p. 45
Coliform bacteria (total), number per 100 ml	MFIMENDO; membrane filter	31501	Greeson, 1977, p. 35
Chlorophyll a, µg/l	Trichromatic	32210	APHA, 1975, p. 1030
Chlorophyll b, µg/l	Trichromatic	32212	APHA, 1975, p. 1030
Chlorophyll c, µg/l	Trichromatic	[illegible]214	APHA, 1975, p. [illegible]30

Table 4.--Continued

Parameter	Method	STORET number	Reference
Water quality (cont'd)			
Total carotenoids, ug/l	Xanthophyll-Trichromatic	--	Strickland & Parsons, 1972
Transparency, meters (Secchi)	Secchi disc	00078	Welch, 1948
Algal growth potential (AGP), mg/l	Electronic particle counter with *Selenastrum* algae standards	--	Greeson, 1977
Pesticides, ug/l, PCB's 1242, 1254, and 1260	Gas chromatography	39496 39504 39508	EPA, 1973
Bottom sediment (dry weight)			
Volatile solids, mg/kg	Gravimetric 550°C	00496	COE,[4] 1976a; EPA, 1974
Total organic carbon, g/kg	Catalytic combustion--infrared	00687	COE, 1976a; EPA, 1974
COD, mg/kg	Oxidation by potassium dichromate	00339	COE, 1976a; EPA, 1974
Total Kjeldahl nitrogen, mg/kg	Distillation and nesslerization	00627	COE, 1976a; EPA, 1974
Total iron, mg/kg	Digestion and atomic absorption	01170	COE, 1976a; EPA, 1974
Total copper, mg/kg	Digestion and atomic absorption	01043	COE, 1976a; EPA, 1974
Total phosphorus (P), mg/kg	Persulfate digestion	00668	COE, 1976a; EPA, 1974
Oil and grease, mg/kg	Extraction (Hexane); gravimetric	00553	COE, 1976a; EPA, 1974
Total lead, mg/kg	Digestion and atomic absorption	01052	COE, 1976a; EPA, 1974
Total manganese, mg/kg	Digestion and atomic absorption	01053	COE, 1976a; EPA, 1974

[4] U.S. Army Corps of Engineers

Table 4.--Continued

Parameter	Method	STORET number	Reference
Bottom sediment (dry weight) (cont'd)			
Total mercury, mg/kg	Digestion and atomic absorption by cold vapor	71921	COE, 1976a; EPA, 1974
Total zinc, mg/kg	Digestion and atomic absorption	01093	COE, 1976a; EPA, 1974
Total cadmium, mg/kg	Digestion and atomic absorption	01028	COE, 1976a; EPA, 1974
Total arsenic, mg/kg	Digestion and atomic absorption	01003	COE, 1976a; EPA, 1974
Total chromium, mg/kg	Digestion and atomic absorption	01029	COE, 1976a; EPA, 1974
Total nickel, mg/kg	Digestion and atomic absorption	01068	COE, 1976a; EPA, 1974
Pesticides, µg/kg	Gas chromatograph	--	DHEW-FDA,[5] 1977
Grain-size analyses	Particle-size analysis	--	ASTM, 1977, method D-422-63

[5]Department of Health, Education and Welfare--Food and Drug Administration.

In an attempt to obtain better plankton data, particularly on zooplankton, a larger Wisconsin-style sampler was employed during part of the second biological run. This net had an 18-inch-diameter mouth, a 48-inch-long conical throat composed of 80-micron aperture mesh net, and a PVC collection bucket equipped with 80-micron aperture mesh filter net. However, this sampler was used only a few times with limited success. The larger mouth diameter and the increased surface area of the throat substantially increased the drag of the net; consequently, it rarely sank lower than 8 feet in the water column. This sampler also required considerable effort by two men just to retrieve it to the boat during each tow. Its use, therefore, was discontinued in favor of the smaller net.

Once collected, each plankton sample (50 to 100 ml) was placed in a glass jar, preserved with a suitable volume (12 to 20 ml) of merthiolated iodine, sealed, and stored until the end of the day when all samples were transported to the laboratory. The length of each plankton tow (in feet) was recorded, later multiplied by .3048 to convert to meters, and then multiplied by a net constant (18.24) to give the estimated volume of water sampled with the net.

In the laboratory, plankton were concentrated by filtering each sample through a funnel (20-mm diameter x 35 mm) fitted with an 80-micron filter net. The planktonic organisms were collected in jars by backwashing the filter with 10 to 25 ml of aqueous merthiolated iodine. The merthiolated iodine solution was prepared by dissolving the following substances in 1 liter of distilled water:

- 36 mg of merthiolate (sodium ethyl mercury thiosalicylate)
- 1 ml of aqueous iodine-potassium iodide (1 g of iodine and 2 g potassium iodide in 300 ml of distilled water)
- 54 mg of sodium borate.

Approximately one-third of the samples contained high amounts of inorganic particles which greatly hindered identification and enumeration of plankton. Hence, it was necessary to remove these particles prior to concentrating. Each sample was agitated and allowed to settle briefly, after which the suspended plankton were decanted. Merthiolated iodine solution was added to the sedimented fraction and the process was repeated until the sediment fraction appeared to contain no plankton. The combined plankton suspension was then concentrated by filtration as described above. The volume of each concentrated sample was measured, and this value was used to calculate a concentration index for each liter of river water sampled which passed through the plankton net.

Ten to 25 percent of each concentrated sample was examined using a compound microscope at either 100x, 430x, 440x, or 1000x magnification and Sedgewick-Rafter counting cells. Counting cells were filled with an appropriate volume of concentrated sample using a disposable pipette. With the exception of diatoms, all phytoplankters and zooplankters within 2 or 3 counting cells were identified, counted, and tabulated. These data were used to calculate the estimated number of organisms (by taxon) per liter (n/l) of river water which passed through the plankton net.

The processing of diatoms for microscopic examination was done in accordance with EPA procedures (Weber, 1973). From each concentrated sample, a 1-ml plankton suspension was incinerated on a hotplate at a temperature of 1000°F. Diatom frustules remained intact and were mounted in Hyrax. The permanent slides obtained from this process were examined under a compound microscope at either 100x, 430x, 440x, or 1000x magnification. All of the diatoms on a slide were identified and counted. Counts of 4 to 10 percent of the diatoms removed from a column of river water were used to calculate the estimated number of diatoms per liter of river water sampled.

Identification of all planktonic organisms was carried to the generic level when practical. When encountered, eggs and nauplii were identified to phylum and enumerated. References used in the identification process included Edmondson (1959), Pennak (1953), Goody (1963), Fritsch (1971), Smith (1950), Prescott (1970), Patrick and Reimer (1966; 1975) and Webber (1971). Multicellular and colonial organisms (coenobia, filaments, and non-coenobic colonies) were counted as individuals. Instead of enumerating the cells of colonies and filaments, each entire colony or filament was counted as an individual within a taxon. However, cells having a solitary bit--for example, cladocera eggs and unicellular algae--were counted individually. Selected planktonic data (table 5) were punched on computer cards and subsequently entered on the E.P.A. STORET system for future retrieval.

2. Benthic Macroinvertebrates--Ponar

Initially, macroinvertebrate samples were collected with a 6- by 6-inch epoxy-coated Ekman bottom dredge. Because of the velocity of the Alabama River and the light weight of the Ekman dredge, a 9- by 9-inch epoxy-coated Ponar sampler was substituted for the Ekman dredge beginning with the second sampling run. At each station, one sample was taken near each bank (littoral zone) and one was collected in midstream (profundal zone) for a total of three samples per station. Each sample was immediately washed through a U.S. Standard No. 30 sieve and the remaining materials were preserved in 70-percent ethanol with rose bengal stain added. The samples were numbered and the date of collection recorded.

Table 5.--Biological STORET parameters, densities, and numbers used during the Alabama-Coosa River study

Parameter	Density	STORET number
Benthic biomass	Grams per square meter (g/m^2)	00571
Other zooplankton	Number per liter (n/l)	60990
Total Protozoa	Number per liter (n/l)	71261
Cladocera	Number per liter (n/l)	71291
Copepods	Number per liter (n/l)	71297
Chlorophyceae, Order Ulotrichales	Number per liter (n/l)	71311
Chlorophyceae, Order Cladophorales	Number per liter (n/l)	71320
Chlorophyceae, Order Chlorococcales	Number per liter (n/l)	71322
Euglenophyceae, Order Euglenales	Number per liter (n/l)	71379
Dinophyceae, Order Dinokontae	Number per liter (n/l)	71383
Chrysophyceae, Order Chrysomonadales	Number per liter (n/l)	71395
Bacillariophyceae, Order Centrales	Number per liter (n/l)	71401
Bacillariophyceae, Order Pennales	Number per liter (n/l)	71408
Caddis	Number per square meter (n/m^2)	75009
[illegible]	Number per square meter (n/m^2)	75018
Chironomids	Number per square meter (n/m^2)	75021
[illegible]	Number per square meter (n/m^2)	75024
[illegible]	Number per square meter (n/m^2)	75027

Samples were transported to the laboratory where the benthic organisms contained in each were separated from the preserved substrate and detritus. Specimens were initially assigned a phylum status; later identified to the class, order, family, and, when practical, genus; and finally tabulated. References used in the identification of various genera included Burch (1975a and b), Edmondson (1959), Edmunds and others (1976), Needham and Westfall (1954), Parrish (1975), Pennak (1953), and Usinger (1956). Several publications of the E.P.A. (Brown, 1976; Cressey, 1976; Ferris and others, 1976; Foster, 1976; Holsinger, 1976; Kenk, 1976; and Williams, 1976) were also consulted. Once all of the organisms were identified and tabulated, the number of individuals per taxon per square meter (n/m^2) of river bottom at each station was calculated and placed in tabular form. Data on the number of individuals per genera were used to calculate a Shannon-Weaver diversity index (H') for each site using the formula

$$H' = -\Sigma P_i \log_2 P_i$$

where P_i is the proportion of the ith (generic) taxon at each site.

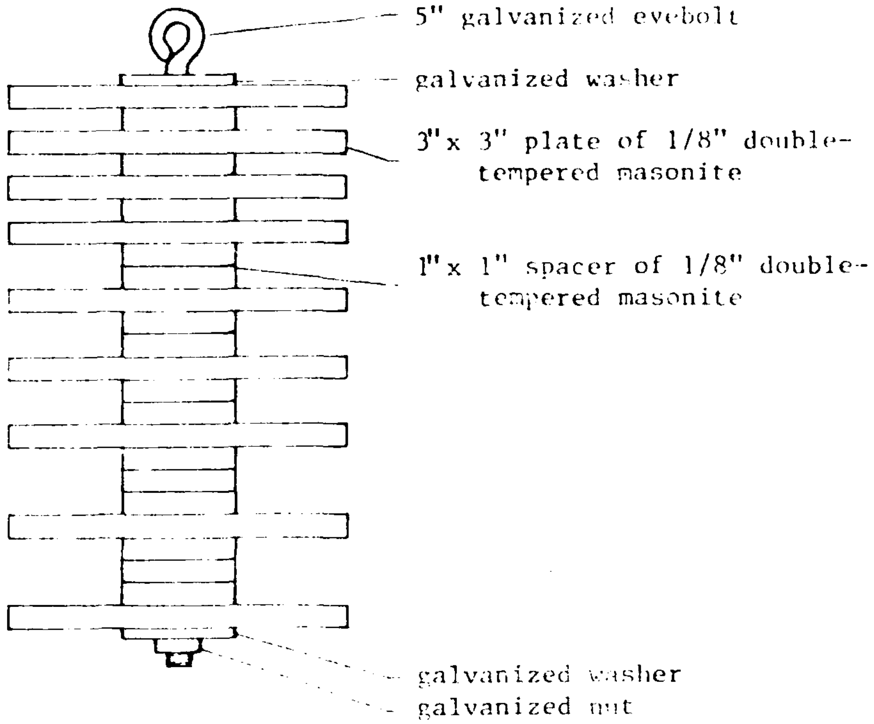
Organisms contained in each of the three samples from each station were air dried and weighed to the nearest tenth of a gram. These weights were averaged and used to calculate benthic biomass in grams per square meter (g/m^2). Benthic biomass data and the densities of selected benthic groups (table 5) were placed in the EPA STORET system for later retrieval.

3. Benthic Macroinvertebrates—multiplate sampler

Multiplate samplers were deployed twice at 34 of the 46 stations. Stations at which samples were collected included 1, 3 through 11, 13 through 17, 19, 21, 23, 24, 26, 28, 30 through 34, 36, 38, and 41 through 46. At each site, a sampler was attached with wire or cable to a buoy or bridge abutment at a depth of approximately 4 feet. All samplers remained in place for approximately six weeks. When the first set of samplers was collected, the second set was deployed.

The samplers employed during the study were Dendy multiplate samplers (Hester and Dendy, 1962) with one modification. Instead of having one consistent spacer width between each plate of double tempered masonite, three different widths were used. Four of the square plates were spaced at intervals of 1/8 inch, three were spaced at intervals of 1/4 inch, and the remaining two were spaced at intervals of 3/8 inch (see diagram). The total surface area of a sampler was approximately 1½ square feet.

Modified Dendy Multiplate Sampler



At the end of a sampling period, the entire sampler was pulled from the water by its attachment cable and immediately placed in a plastic quart container filled with 70-percent aqueous ethanol to which rose bengal stain was added. To our knowledge, no organisms were lost during the retrieval of the multiplate samplers. To test this procedure, several of the samplers were retrieved in a large galvanized bucket that was placed under the sampler before it was pulled from the water. After the sampler was placed in preservative, the water in the bucket was sieved and found to contain no benthic organisms.

In the laboratory, each sampler was dismantled and the plates were cleaned with a camel-hair brush to remove the organisms. Most samplers were left in alcohol six to twelve weeks before processing. During processing, certain amounts of glue and wood fiber were also removed from the plates, which necessitated washing the samples several times through a U.S. Standard No. 30 sieve prior to identification. The removed organisms were sorted and identified to the family level and tabulated as to presence or absence. The dominant family was determined on the basis of the relative numbers of organisms References used in identification of the organisms found on the multiplate samplers are listed above in the section on Ponar samples.

4. Aquatic Macrophytes

Four trips, each lasting several days, were made to the study area. The river was floated in a 14-foot aluminum boat, during which time observations were made of the aquatic vegetation along each shore. When a population of plants was sighted, the location was recorded and a list of plants present was made. Species were identified using the keys and descriptions found in Beal (1977) and classified as to emergent (E), freefloating (Fl), floating-leaved (Fl-lv), or submersed (S). Voucher specimens of most species were taken and are on deposit at the University of Alabama Herbarium (UNA).

IV. RESULTS

A. Chemical

1. Water-quality Parameters

Water samples collected at each of the 46 sites were analyzed for 39 water-quality parameters, which included chemical, physical, bacteriological, and biological components. Results of the analyses (table A-1) indicated that, generally, the water quality of the Alabama River was within acceptable water-quality limits as defined by the EPA (table 6). A range of concentration for each of the 39 parameters identified in the study is presented in this section; violations of Federal or State water criteria are noted. A more complete section of results may be found for the Jones Bluff, William "Bill" Dannelly, and Claiborne Reservoirs on the Alabama River in the three reports based on the 1978 sampling period, which followed the period covered by this report.

Ammonia as nitrogen ranged from 0 to 1.6 milligrams per liter (mg/l) and averaged 0.1 mg/l throughout the study (figs. 5 through 10). The fish and wildlife criteria for ammonia as nitrogen (.02 mg/l) were exceeded at all stations during at least three of the six sampling runs. At some stations, the criteria were exceeded during every run (table A-1).

The temperature of the water ranged from a high value of 31.0°C during August 1977 to a low value of 5.0°C in December. The average water temperature during the study was 19.0°C.

The specific conductance ranged from 81 to 203 micromhos per centimeter (μmhos/cm) during the August through December 1977 study period. The average specific conductance was 128 μmhos/cm during the study (figs. 11 through 16).

The apparent color, reported in platinum-cobalt (Pt-Co) units, ranged from 10 to 195 during the August through December 1977 study period. The mean for apparent color throughout the study was 102 Pt-Co units.

The total coliform bacteria concentration ranged from 35 to 210,000 colonies per 100 milliliters (CT/100 ml). Fecal streptococci bacteria concentrations ranged from 8 to 25,000 CT/100 ml.

Table 6.--Acceptable water-quality criteria

(Modified from U.S. EPA, 1976)

Parameter	Fish and wildlife criteria
pH	6-8.5
Dissolved oxygen	5 mg/l
Ammonia as N	.02 mg/l
Fecal coliform	2000 colonies/100 ml
Chloride	*
Color	*
Fluoride	*
Iron	300 μg/l
Manganese	100 μg/l
Nitrate as N	*
Nitrite as N	*
Sulfate	*
Total dissolved solids (filterable residue at 180°C)	*
Turbidity	50 Jackson turbidity units (JTU)

*No specific value appointed.

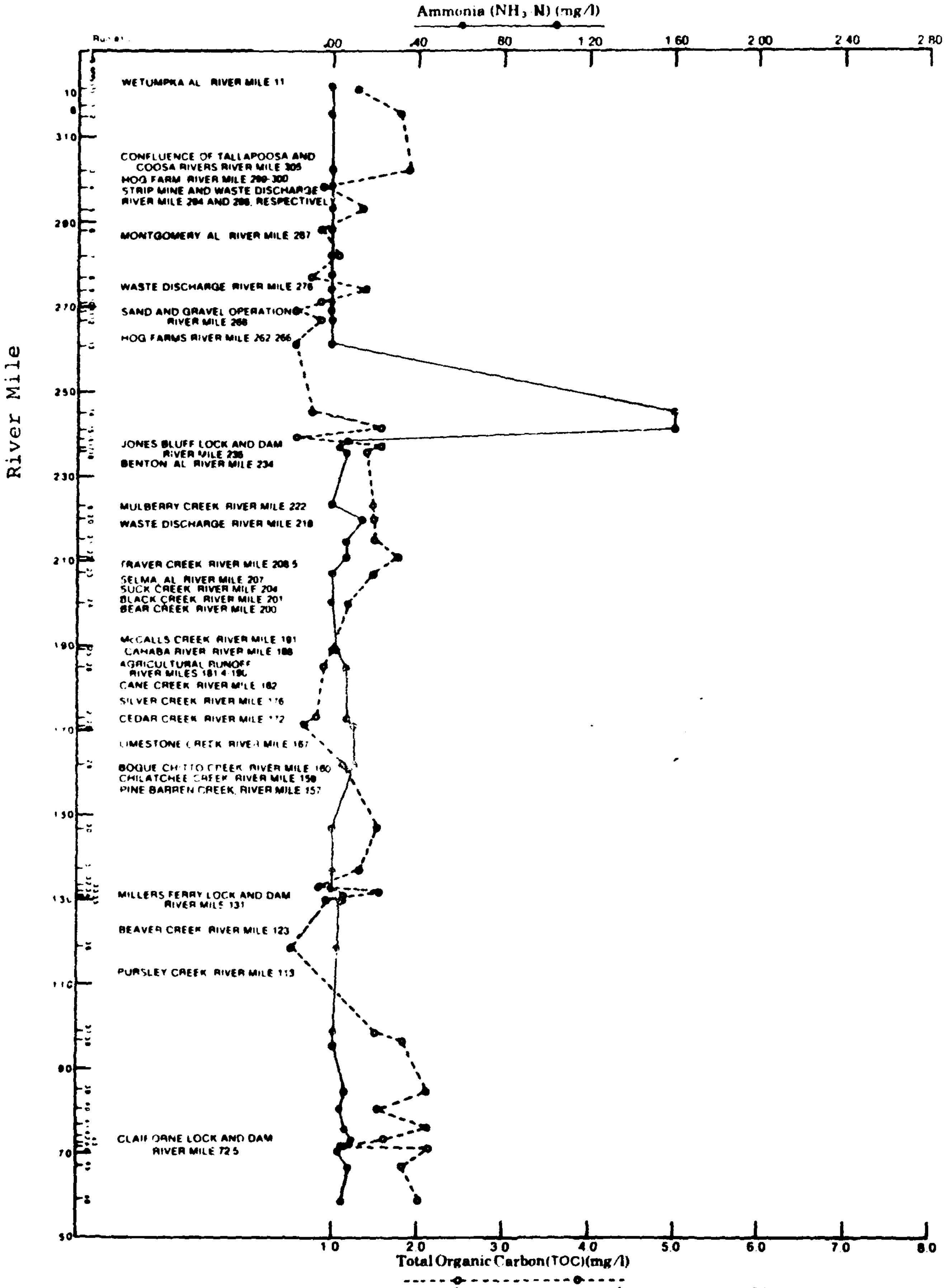


Figure 5.--Ammonia and total organic carbon concentrations versus distance at 46 Alabama-Coosa River system stations during the period August 9-25, 1977.

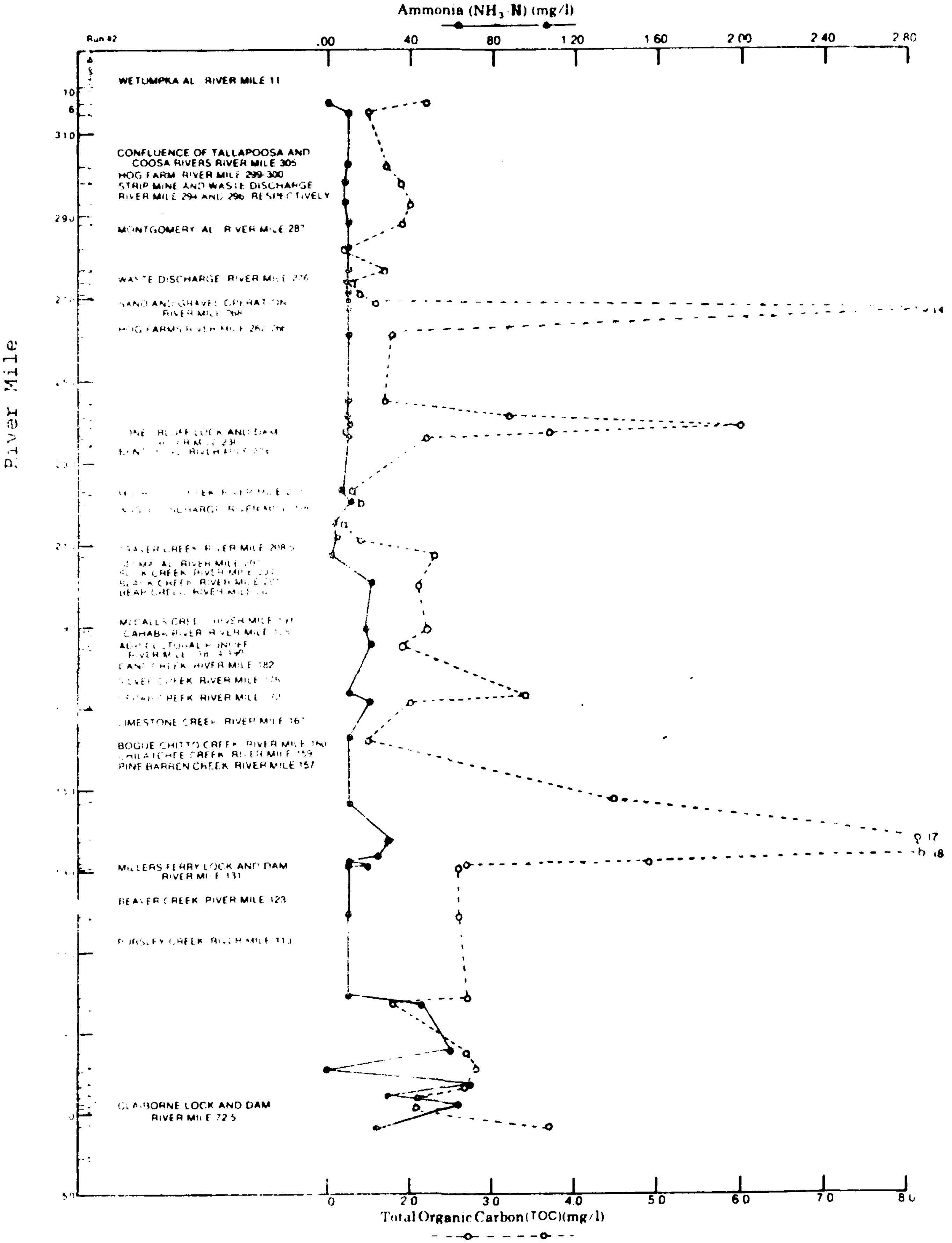


Figure 6.--Ammonia and total organic carbon concentrations versus distance at 46 Alabama-Coosa River system stations during the period August 29 through September 14, 1977.

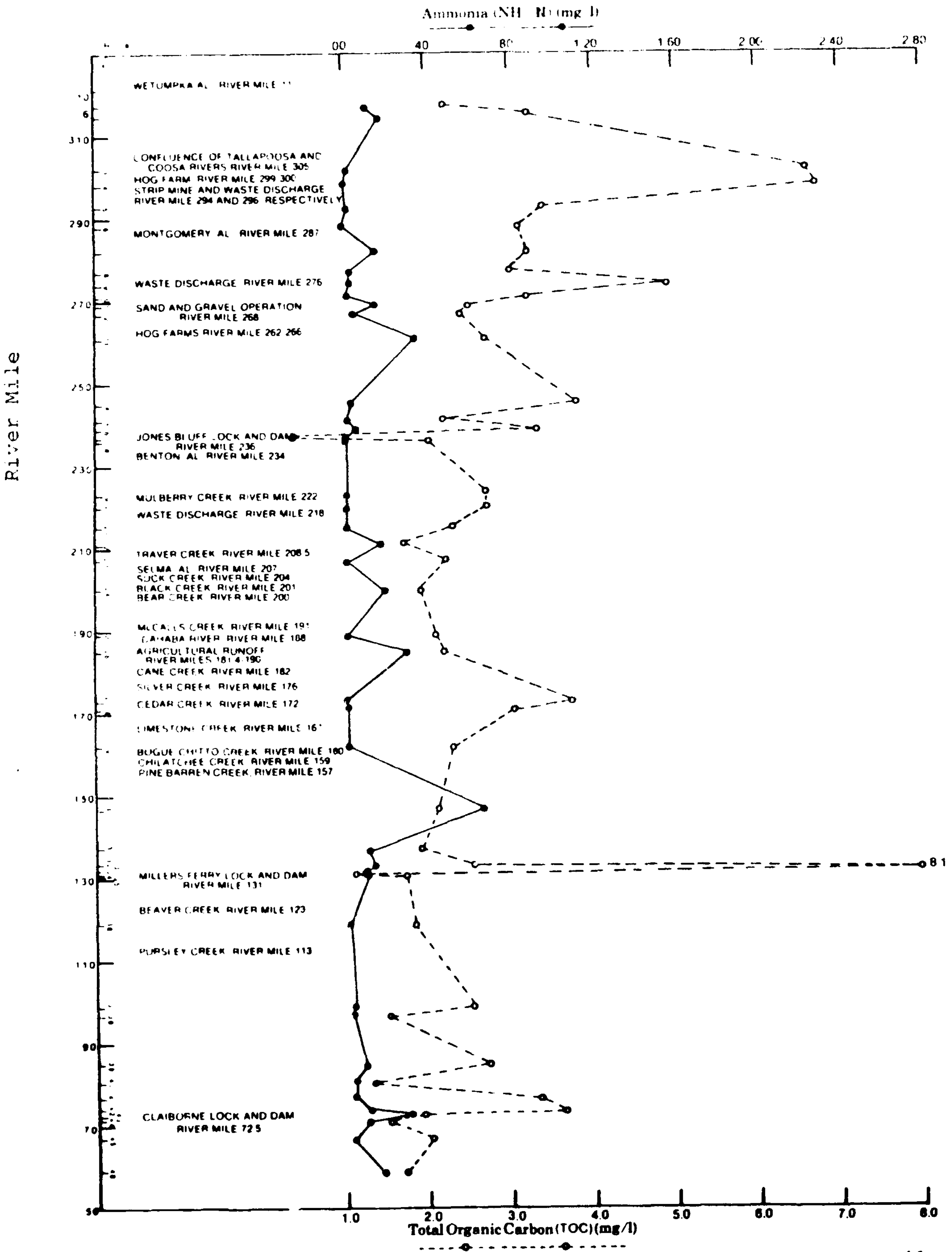


Figure 7.--Ammonia and total organic carbon concentrations versus distance at 46 Alabama-Coosa River system stations during the period September 19 through October 4, 1977.

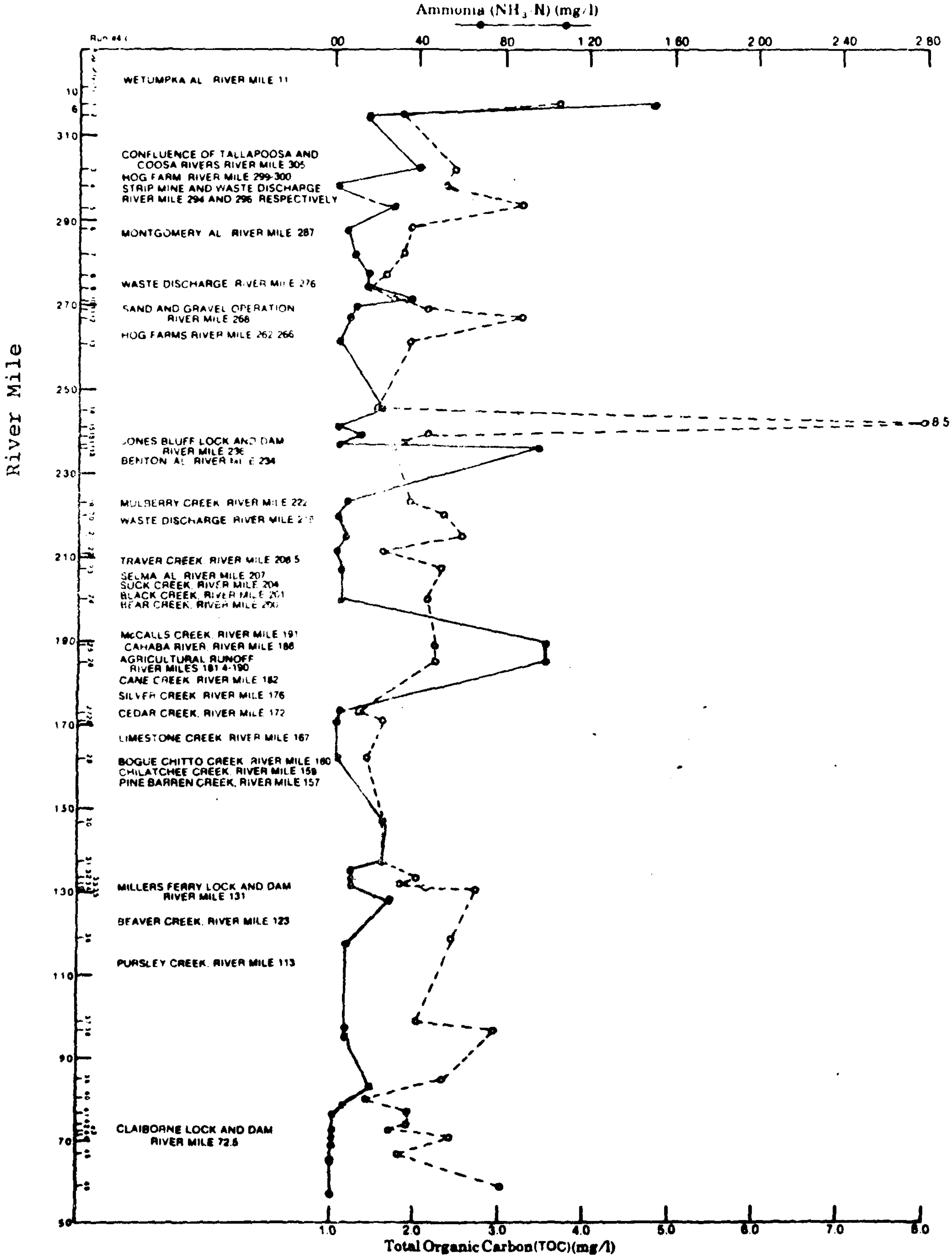


Figure 8.--Ammonia and total organic carbon concentrations versus distance at 46 Alabama-Coosa River system stations during the period October 11-25, 1977.

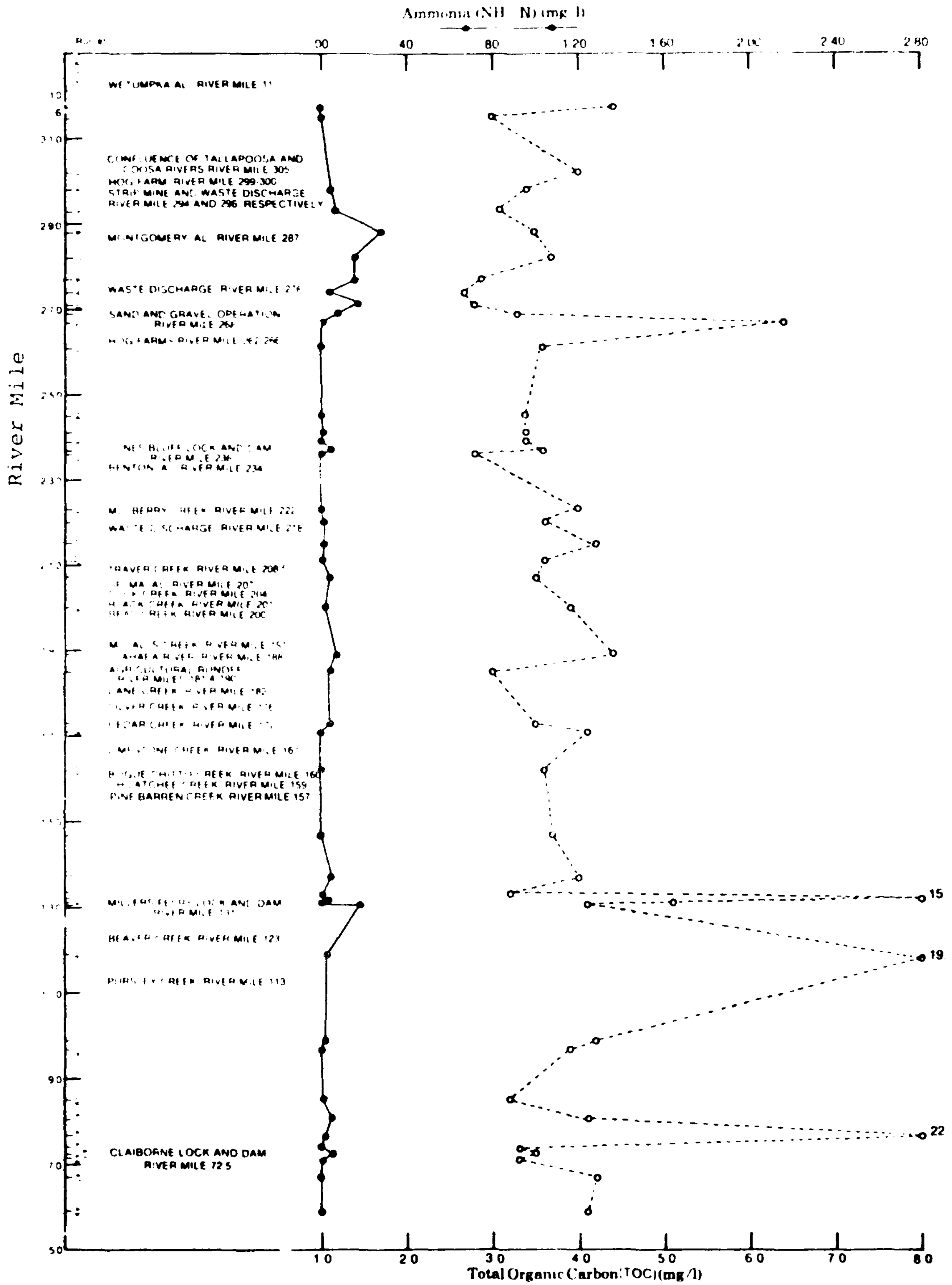


Figure 9.--Ammonia and total organic carbon concentrations versus distance at 46 Alabama-Coosa River system stations during the period October 31 through November 17, 1977.

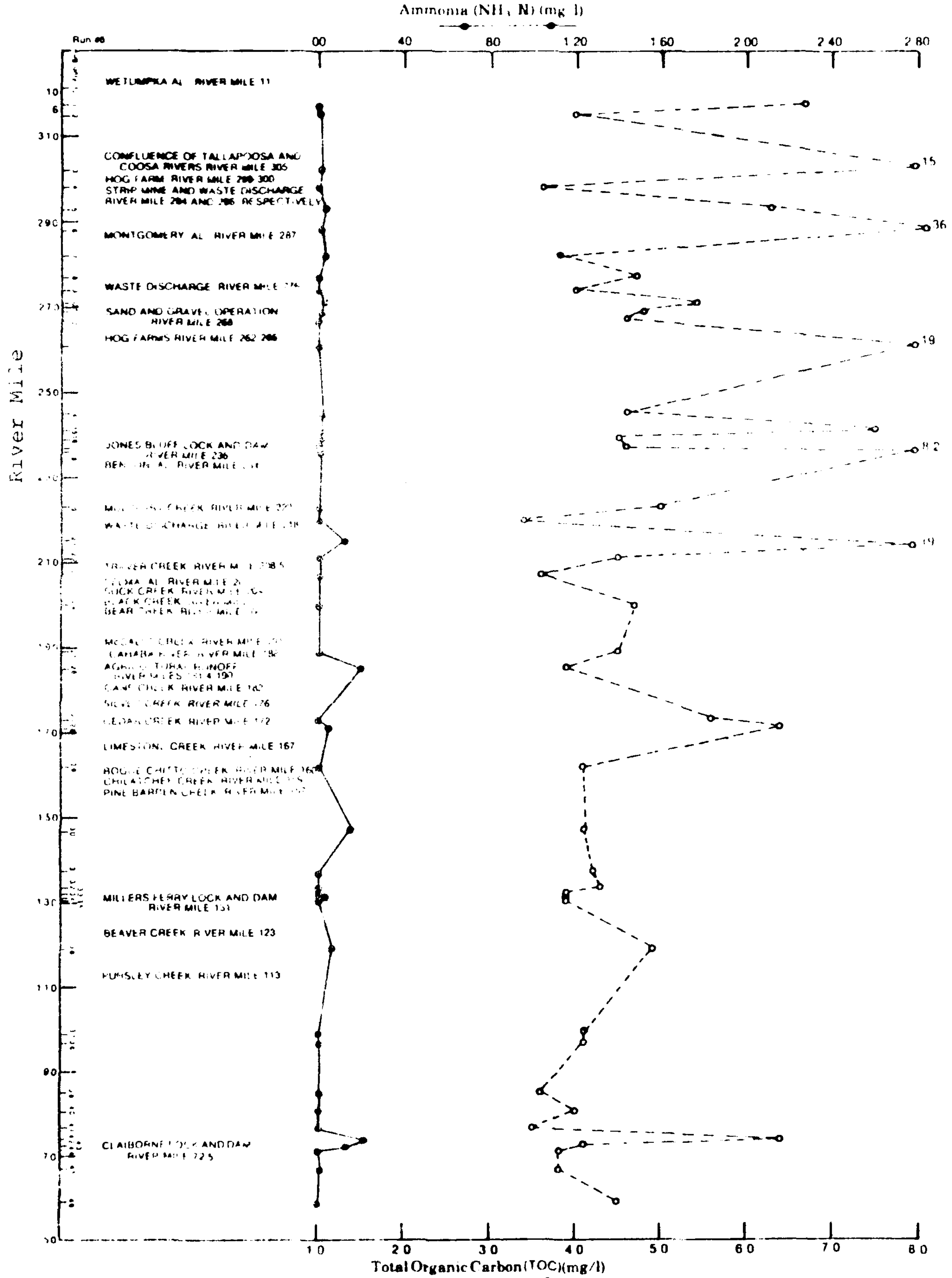


Figure 10.--Ammonia and total organic carbon concentrations versus distance at 46 Alabama-Coosa River system stations during the period November 21 through December 8, 1977.

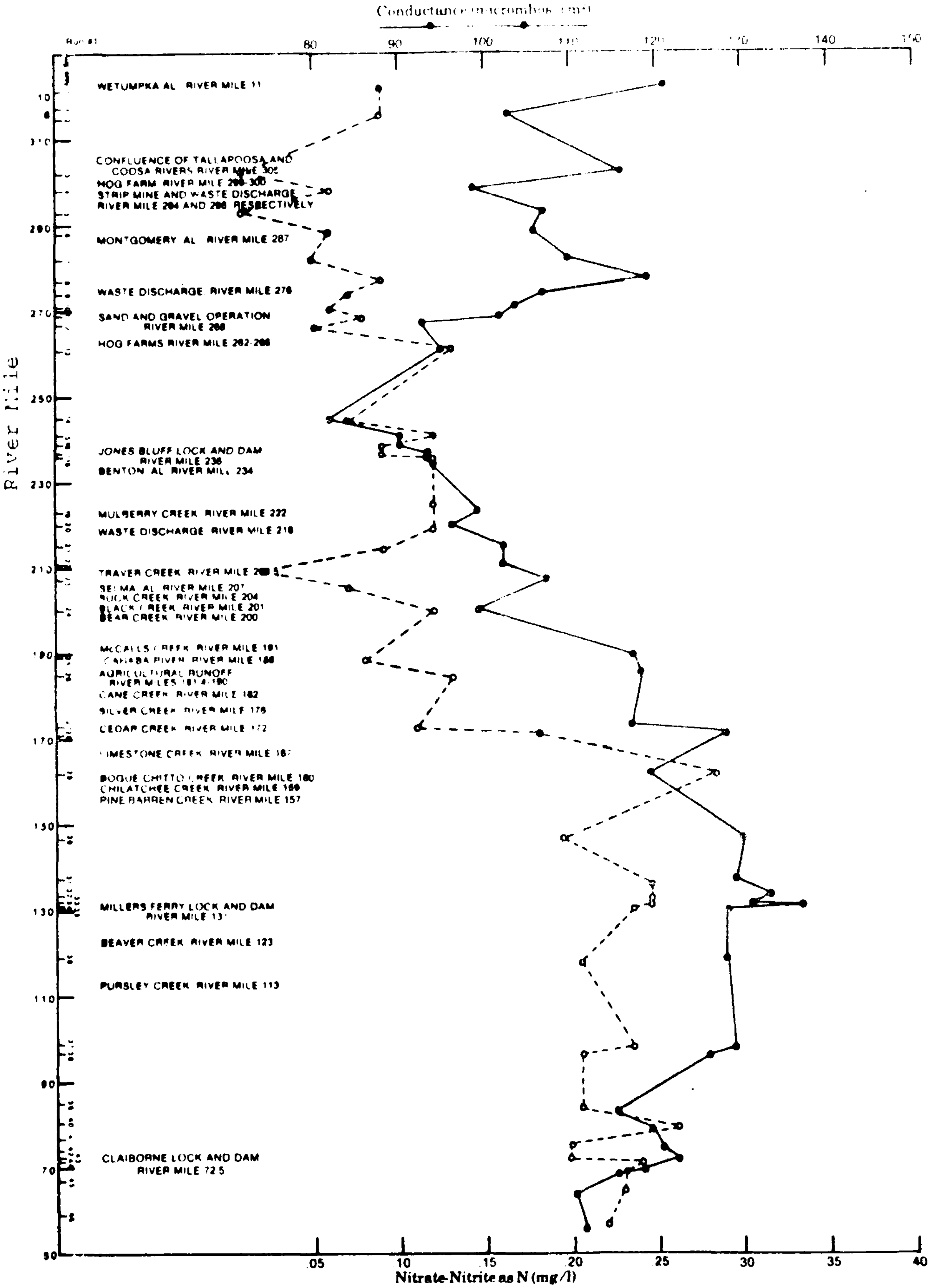


Figure 11.--Conductance and nitrate-nitrite as N concentrations versus distance at 46 Alabama-Coosa River system stations during the period August 9-25, 1977.

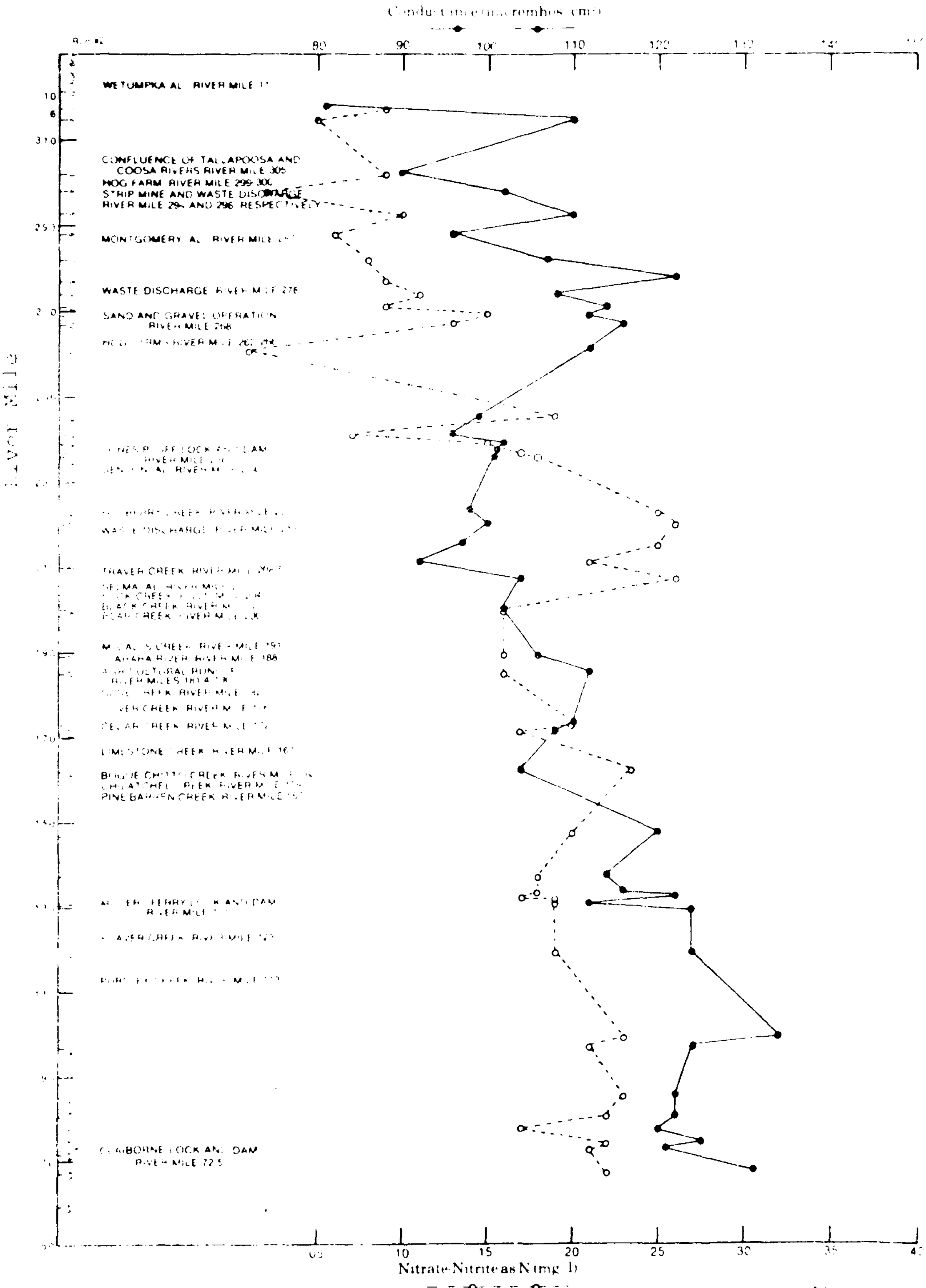


Figure 12.--Conductance and nitrate-nitrite as N concentrations versus distance at 46 Alabama-Coosa River system stations during the period August 29 through September 14, 1977.

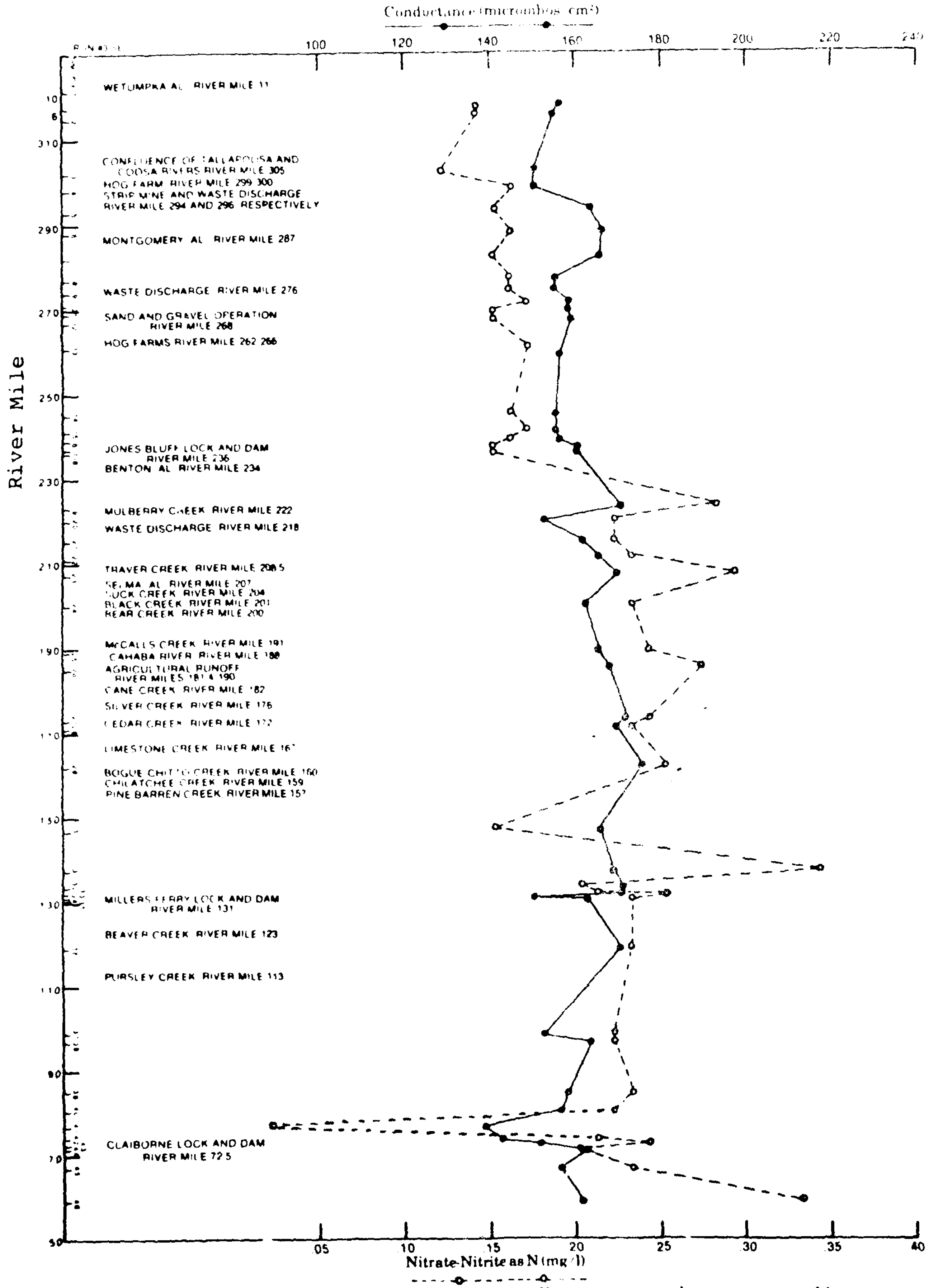


Figure 13.--Conductance and nitrate-nitrite as N concentrations versus distance at 46 Alabama-Coosa River system stations during the period September 19 through October 4, 1977.

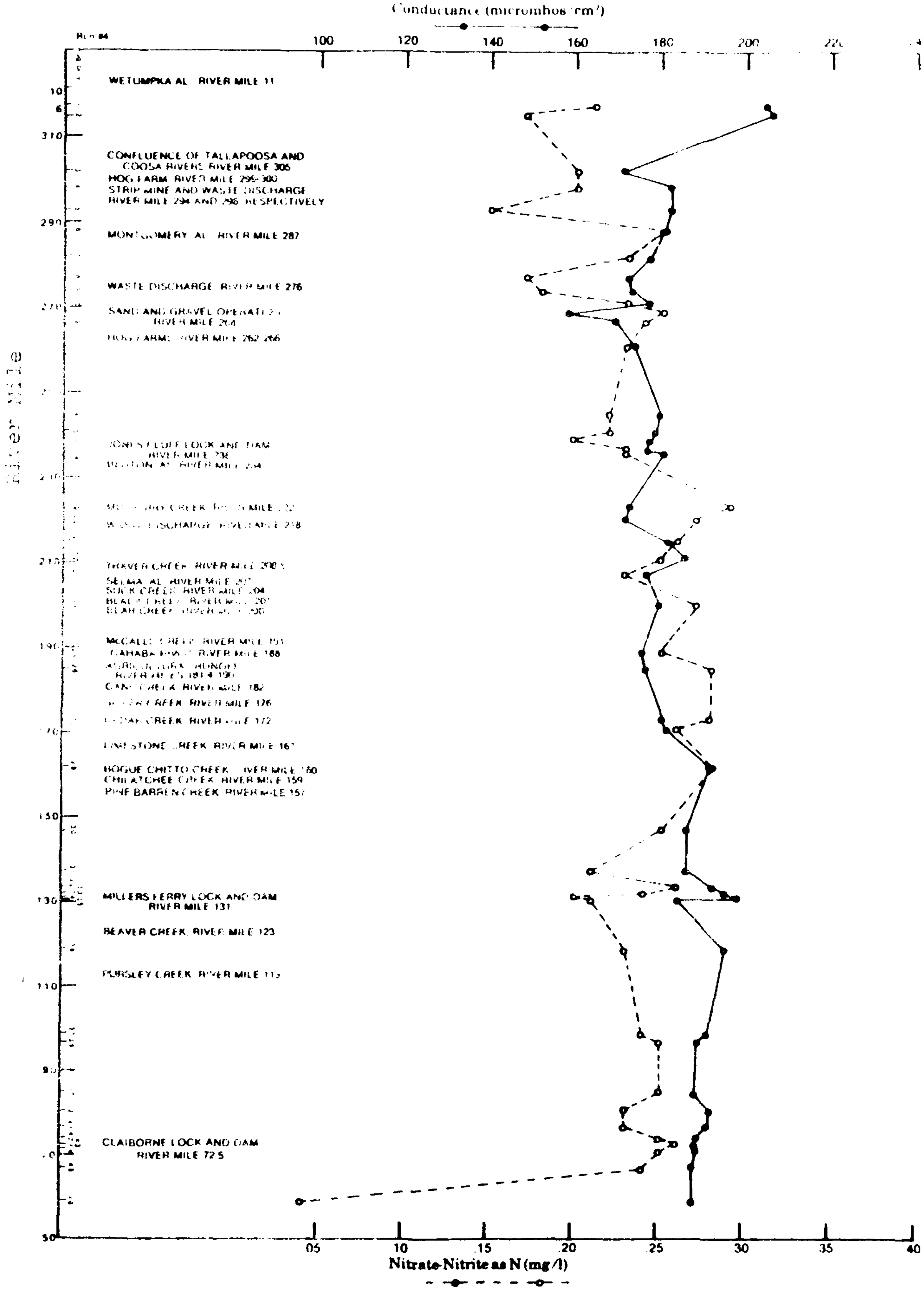


Figure 14.--Conductance and nitrate-nitrite as N concentrations versus distance at 46 Alabama-Coosa River system stations during the period October 11-25, 1977.

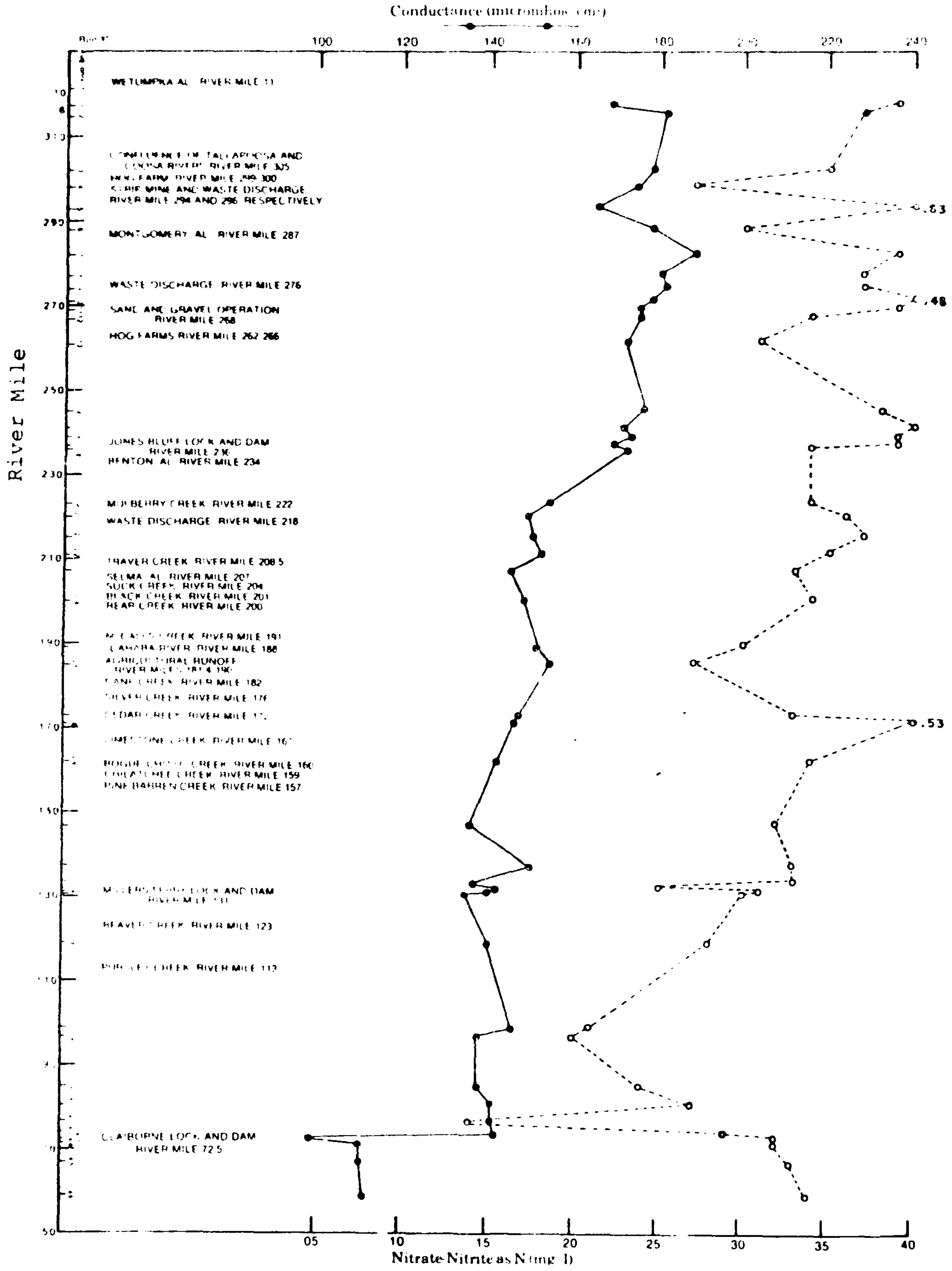


Figure 15.- -Conductance and nitrate-nitrite as N concentrations versus distance at 46 Alabama-Coosa River system stations during the period October 31 through November 17, 1977.

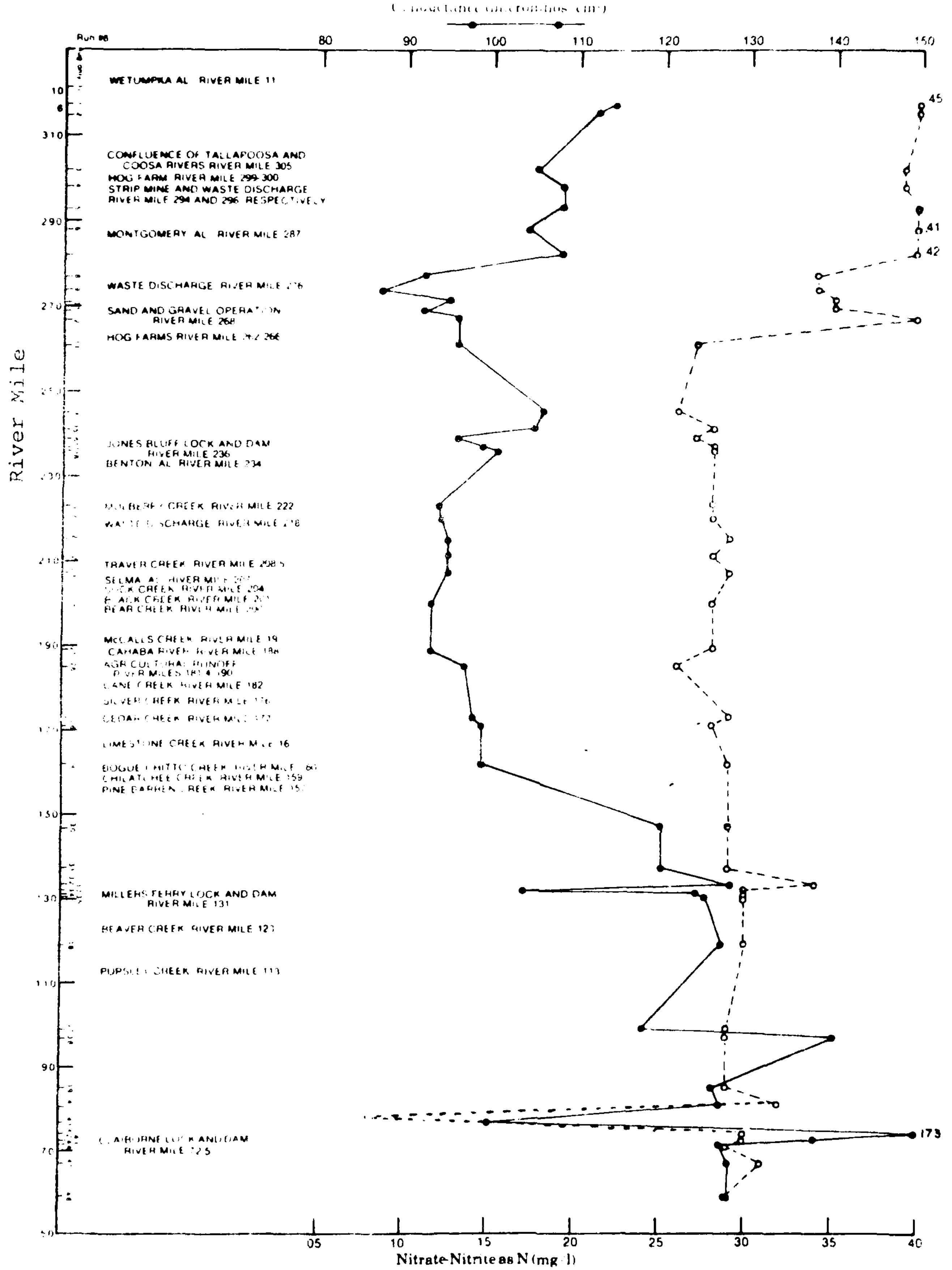


Figure 16.--Conductance and nitrate-nitrite as N concentrations versus distance at 46 Alabama-Coosa River system stations during the period November 21 through December 8, 1977.

During the study, fecal coliform values were above 2000 CT/100 ml at stations 6 (2600 CT/100 ml) and 7 (2900 CT/100). The values for this parameter ranged from 0 to 2900 CT/100 ml for the entire 1977 study period.

The nutrient concentrations on the Coosa-Alabama River for the period August 9 through December 8, 1977, ranged from 0 to .28 mg/l for nitrate-nitrite as nitrogen (figs. 11 through 16) and from .04 to .33 mg/l for total phosphorus (figs. 17 through 22). The orthophosphorus as P concentration ranged from 0.0 to 0.18 mg/l for all sites throughout the study period. The total Kjeldahl nitrogen (TKN) concentration ranged from 0.0 to 19 mg/l throughout the six sampling runs for all 46 sampling sites. None of the above nutrient concentrations exceeded the fish and wildlife water-quality criteria.

The oxygen-related parameters sampled and analyzed during the study included dissolved oxygen (DO), total organic carbon (TOC), chemical oxygen demand (COD), and five-day biochemical oxygen demand (BOD_5). Dissolved oxygen concentrations (figs. 23 through 28) ranged from a low of 5.2 mg/l to a high of 13.8 mg/l. Total organic carbon (figs. 5 through 10) ranged from 0.3 to 36 mg/l and averaged 3.5 mg/l. The COD concentration ranged from a low of 2.0 mg/l to a high of 24 mg/l. Five-day biochemical oxygen demand ranged from 0 to 2.8 mg/l (table A-3).

Dissolved oxygen, temperature, conductivity and pH were sampled at specified depths across the width of the reservoir at stations 8, 16, 21, 32, 37, and 43 during August (table A-3) and at stations 17, 33, 34, and 43 during November and December (table A-4) to define the mixing and stratification within the reservoir. Additionally, oxidation-reduction potential (ORP) was sampled as stated above for stations 17, 33, 34 and 43 to further define potential stratification problems (table A-4). Graphical representations of the above data are found in figures A-1 through A-9 for August and figures A-10 through A-13 for November and December.

Dissolved chloride values ranged from 0 to 17 mg/l. The average chloride concentration was 7 mg/l for the entire study period.

Sulfate (SO_4) ranged from 1.2 to 16 mg/l with the average concentration being 6.7 mg/l for the entire study period.

Secchi disk readings varied from a maximum of 1.15 to a low of 0.50 meters (m); the average reading for the entire period was 0.87 m.

Oxidation reduction potential (ORP) values ranged from +50 to +250 millivolt (mv); the average ORP was +190 for the entire study period.

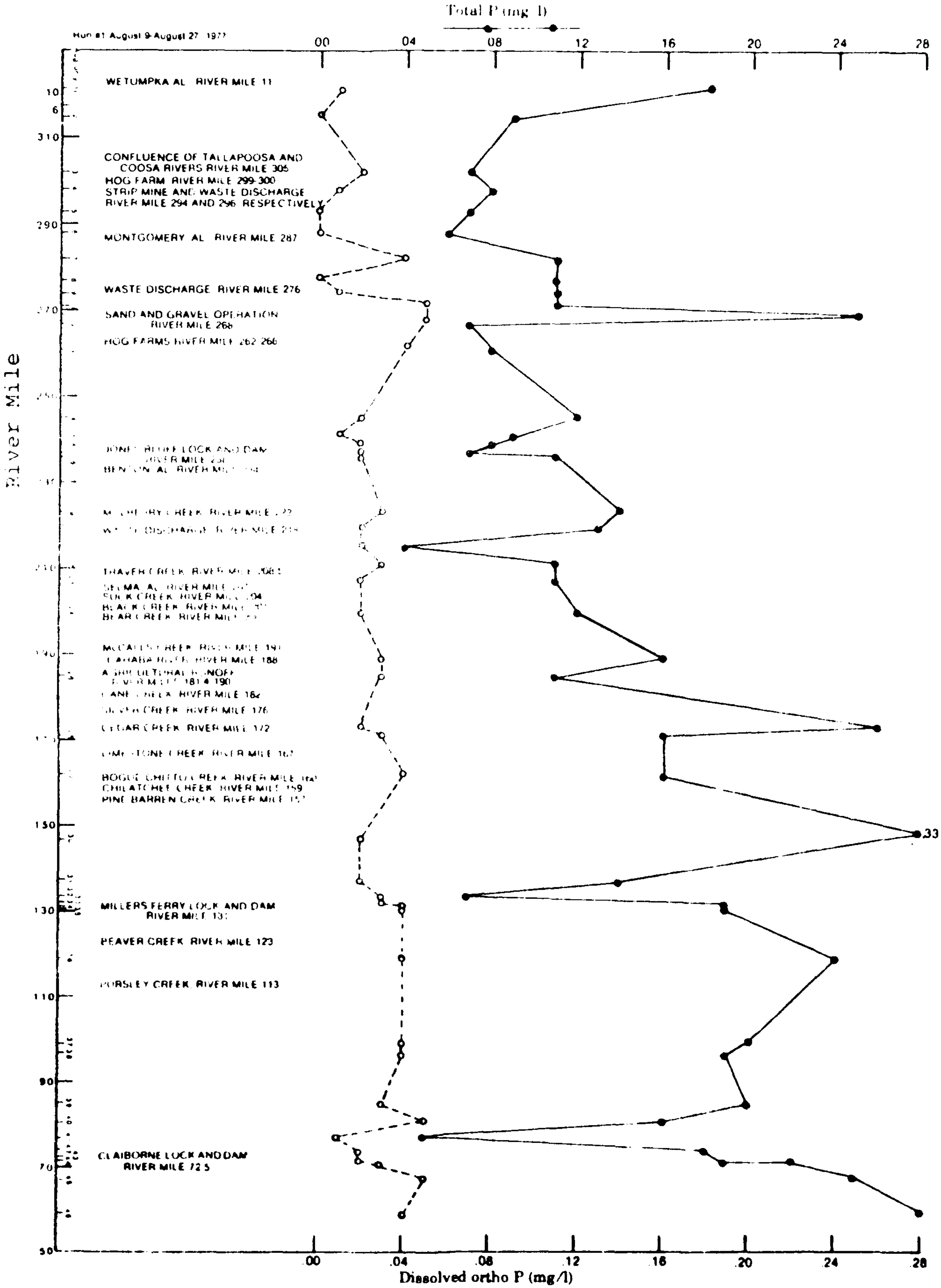


Figure 17.--Total P and dissolved ortho P concentrations versus distance at 46 Alabama-Coosa River system stations during the period August 9-25, 1977.

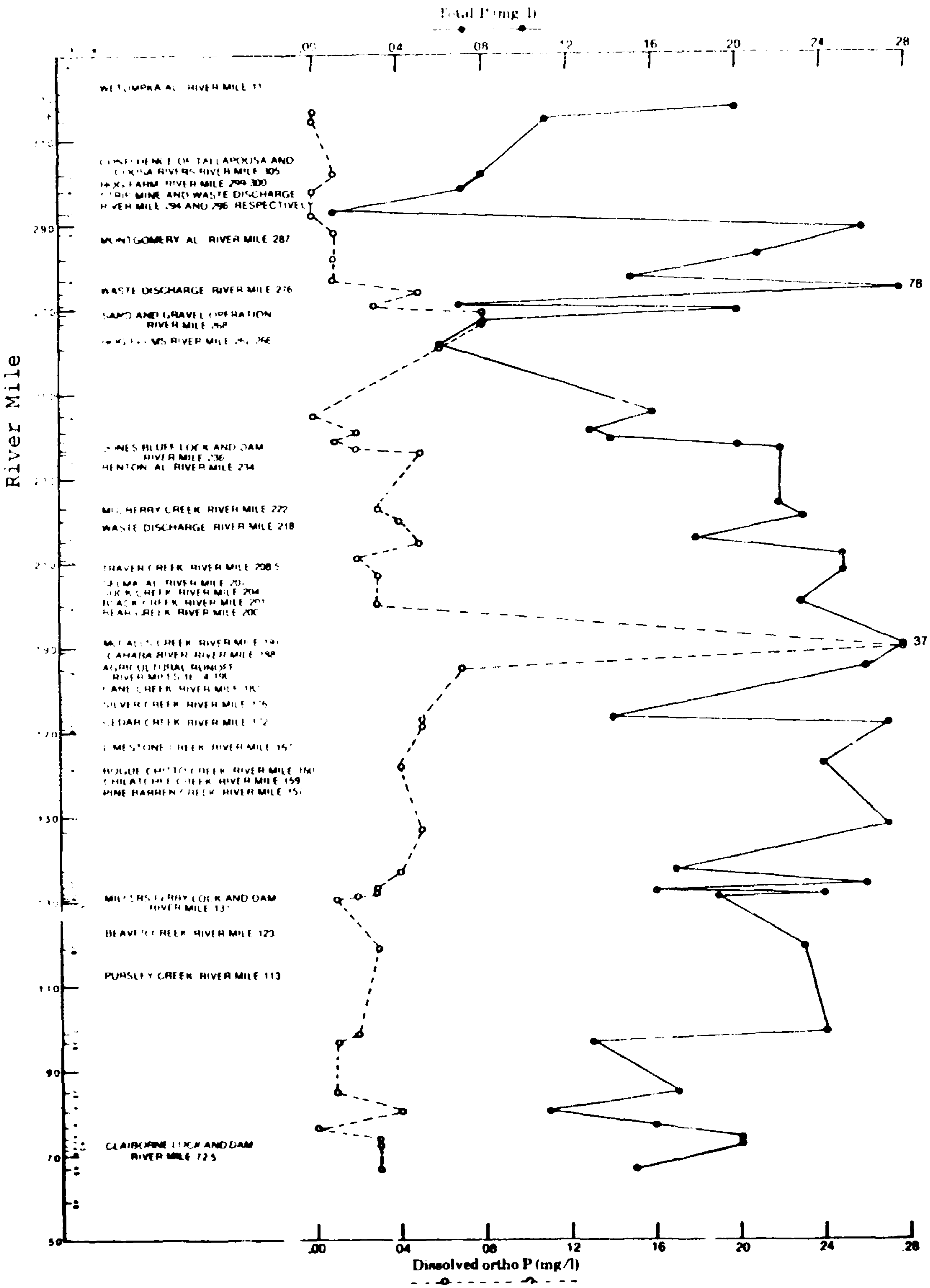


Figure 18.--Total P and dissolved ortho P concentrations versus distance at 46 Alabama-Coosa River system stations during the period August 29 through September 14, 1977.

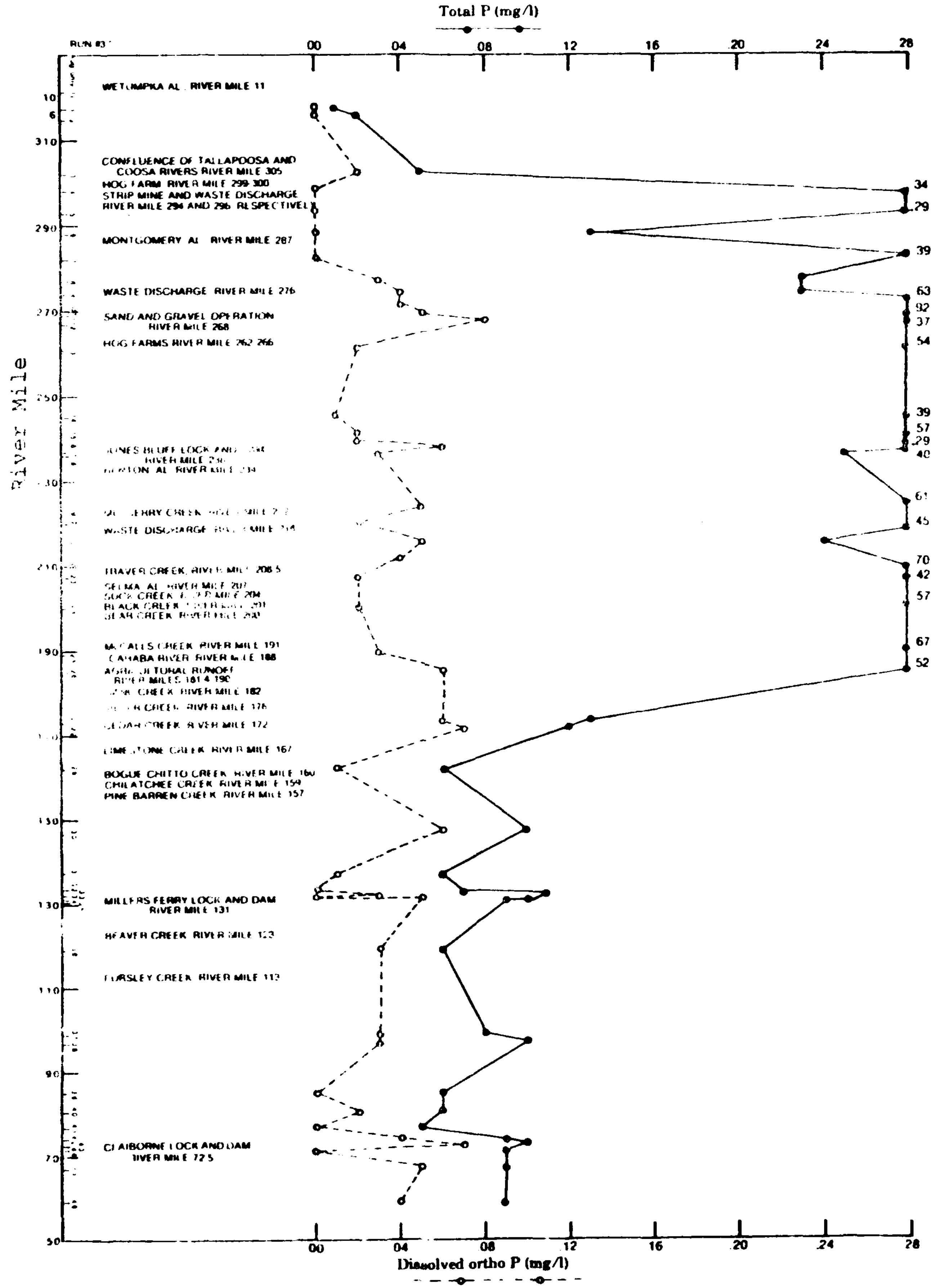


Figure 19.--Total P and dissolved ortho P concentrations versus distance at 46 Alabama-Coosa River system stations during the period September 19 through October 4, 1977.

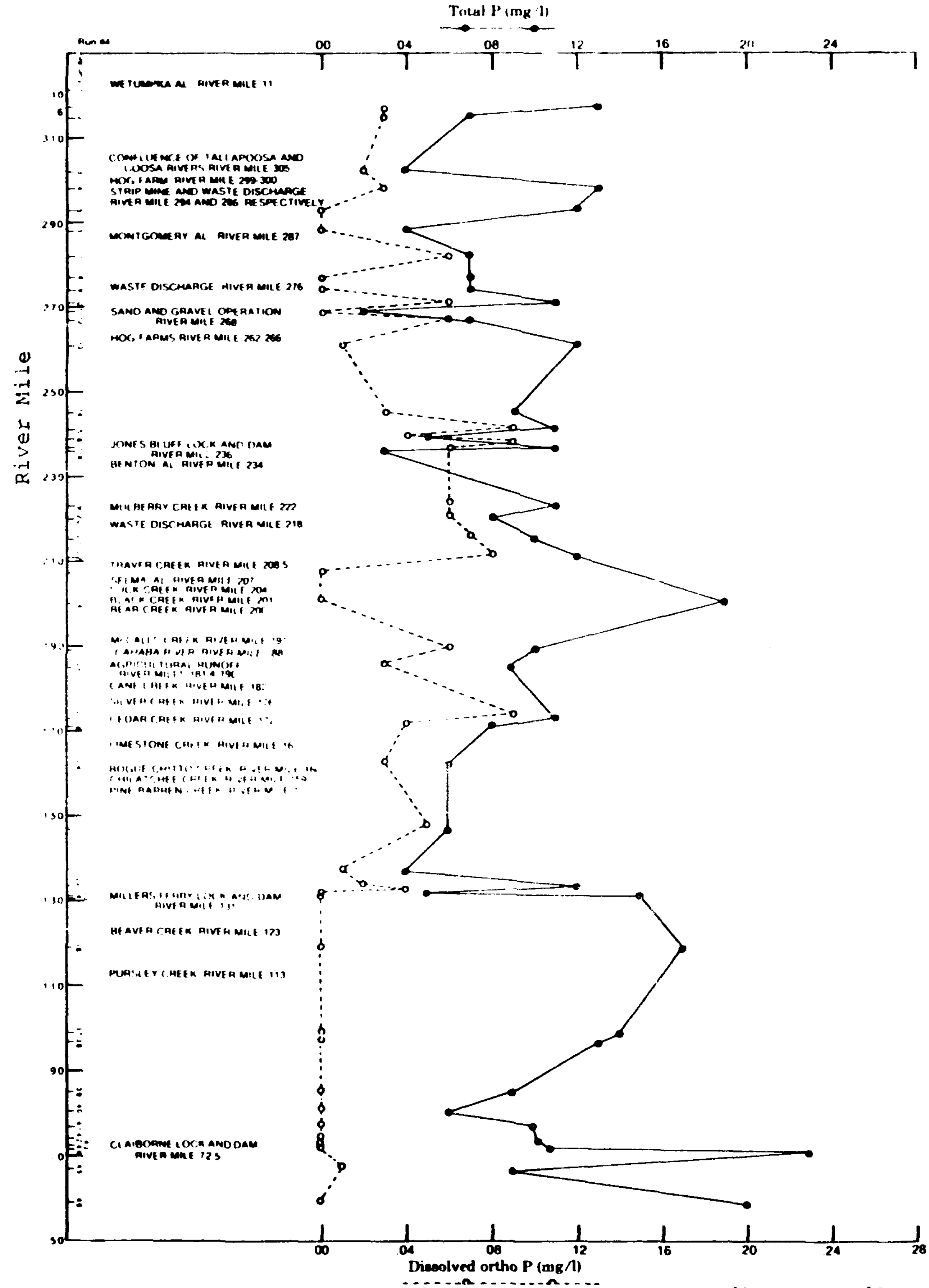


Figure 20.--Total P and dissolved ortho P concentrations versus distance at 46 Alabama-Coosa River system stations during the period October 11-25, 1977.

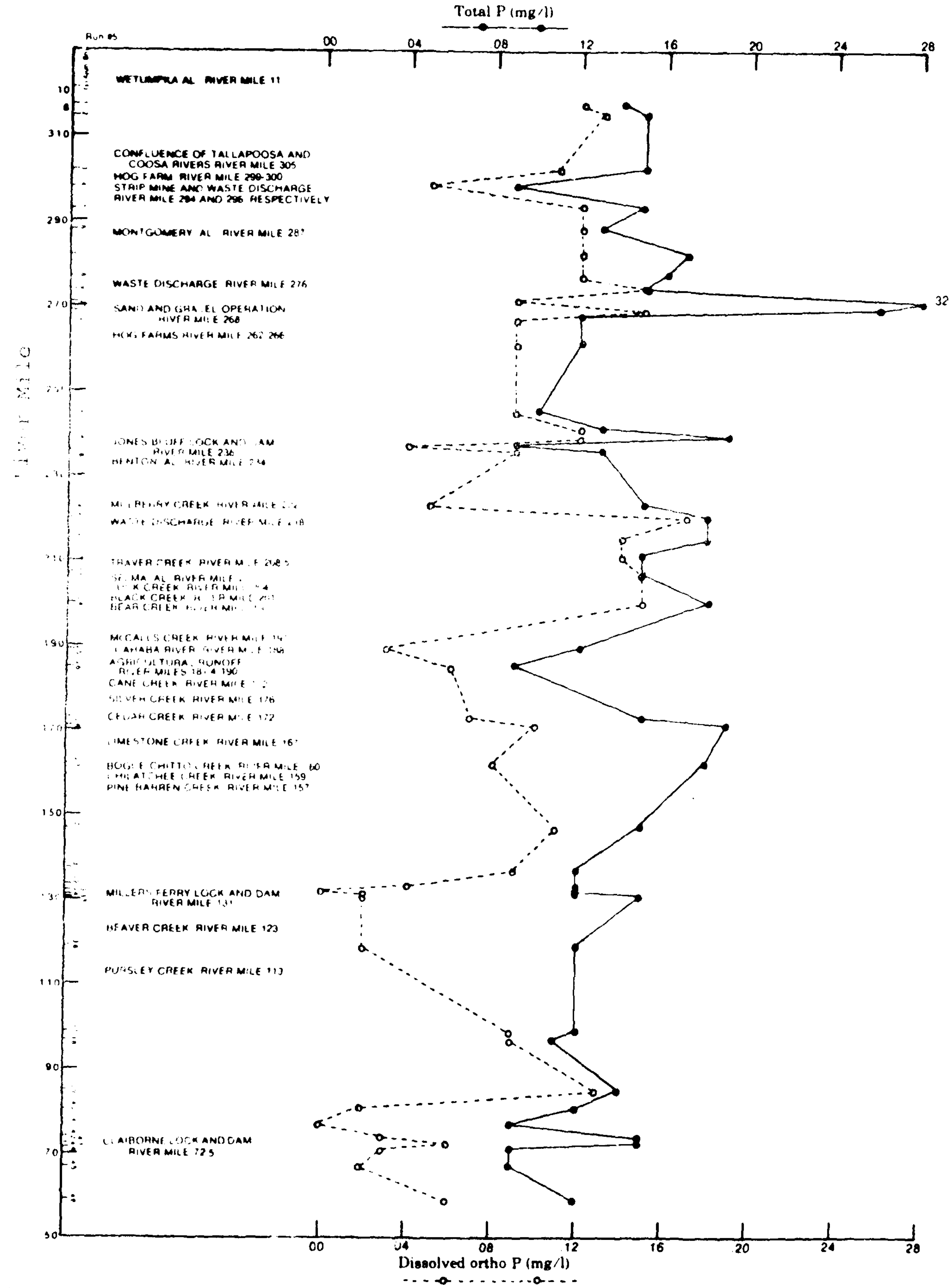


Figure 21.--Total P and dissolved ortho P concentrations versus distance at 46 Alabama-Coosa River system stations during the period October 31 through November 17, 1977.

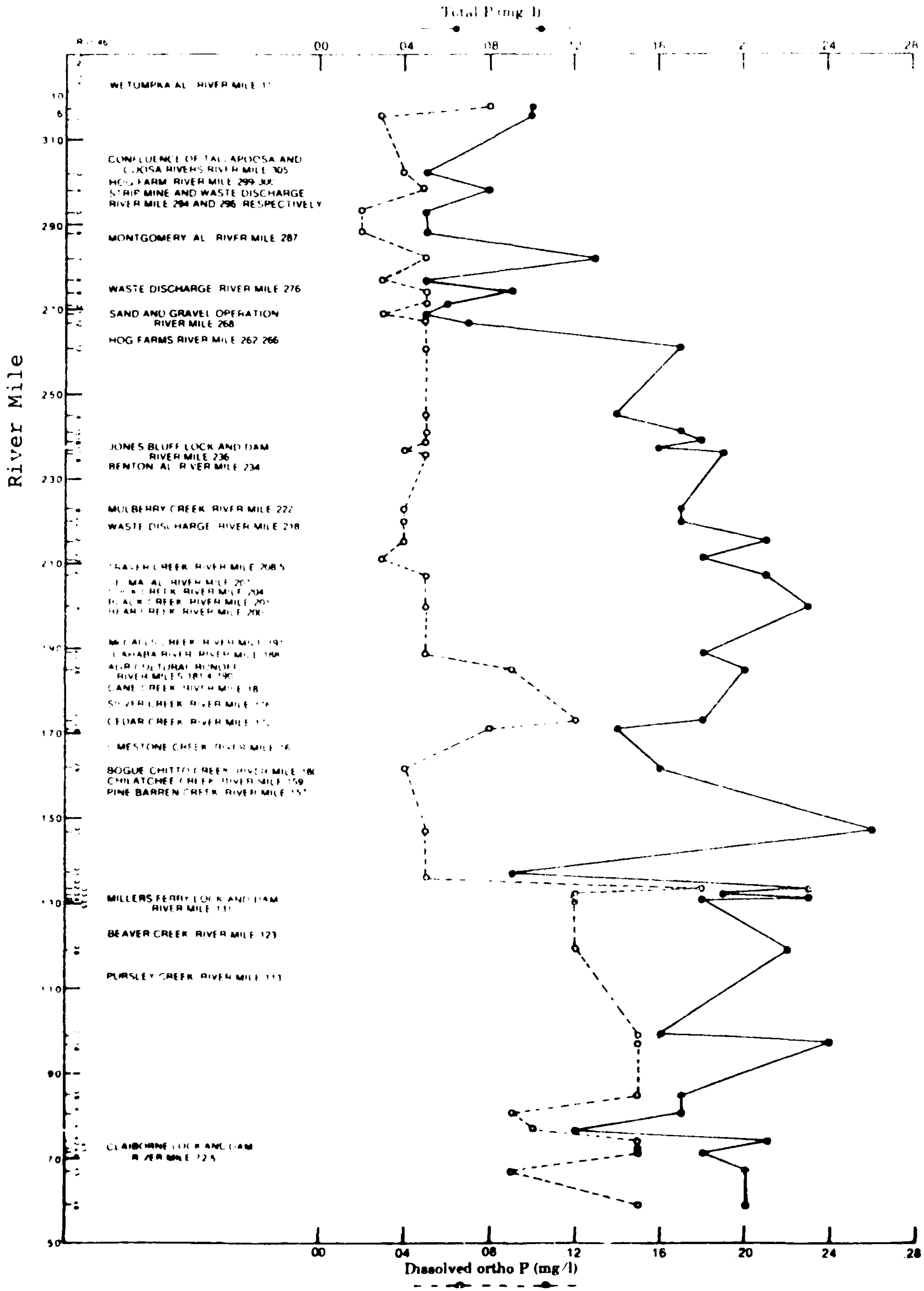


Figure 22.--Total P and dissolved ortho P concentrations versus distance at 46 Alabama-Coosa River system stations during the period November 21 through December 8, 1977.

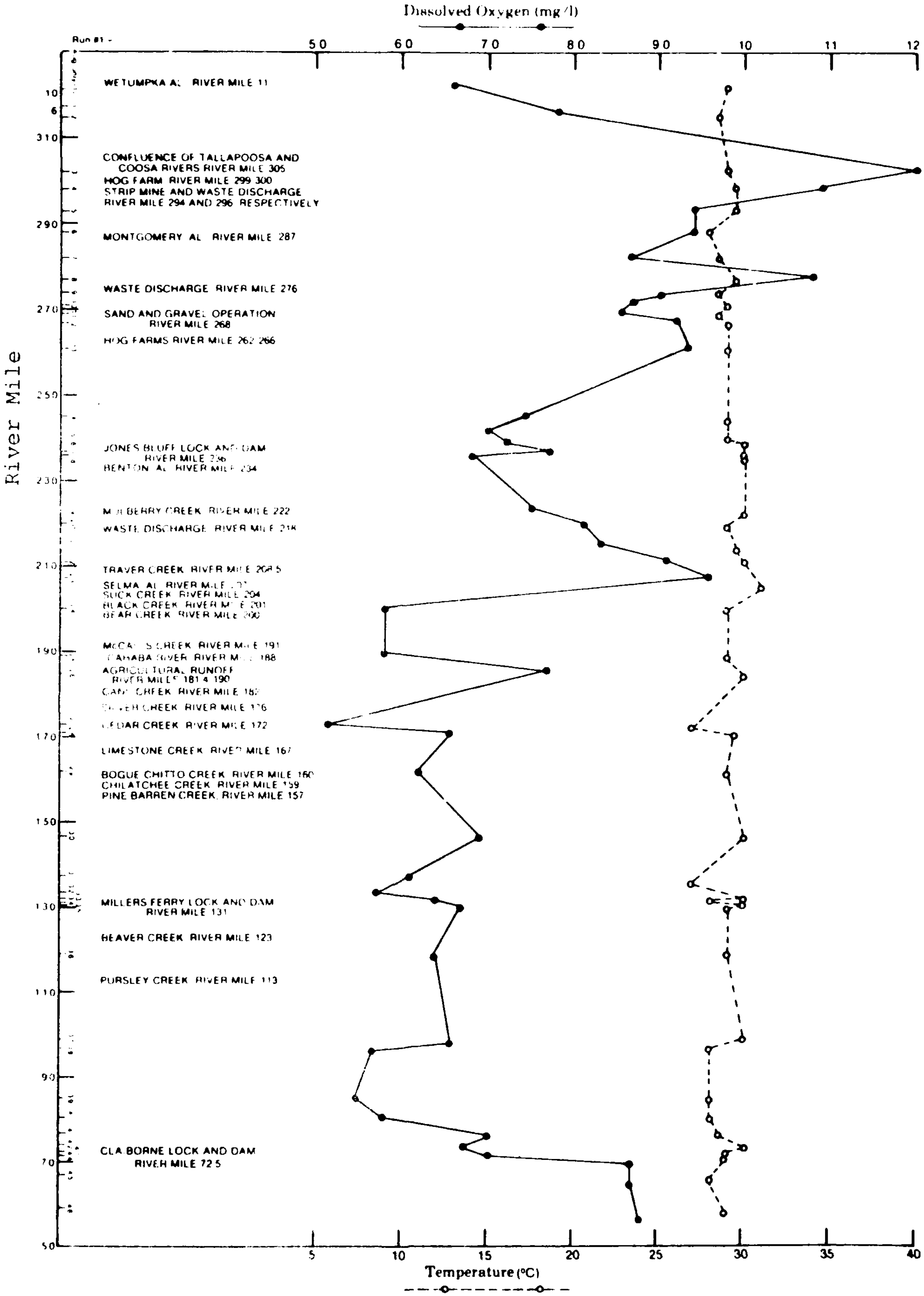


Figure 23.--Dissolved oxygen and temperature values versus distance at 46 Alabama-Coosa River system stations during the period August 9-25, 1977.

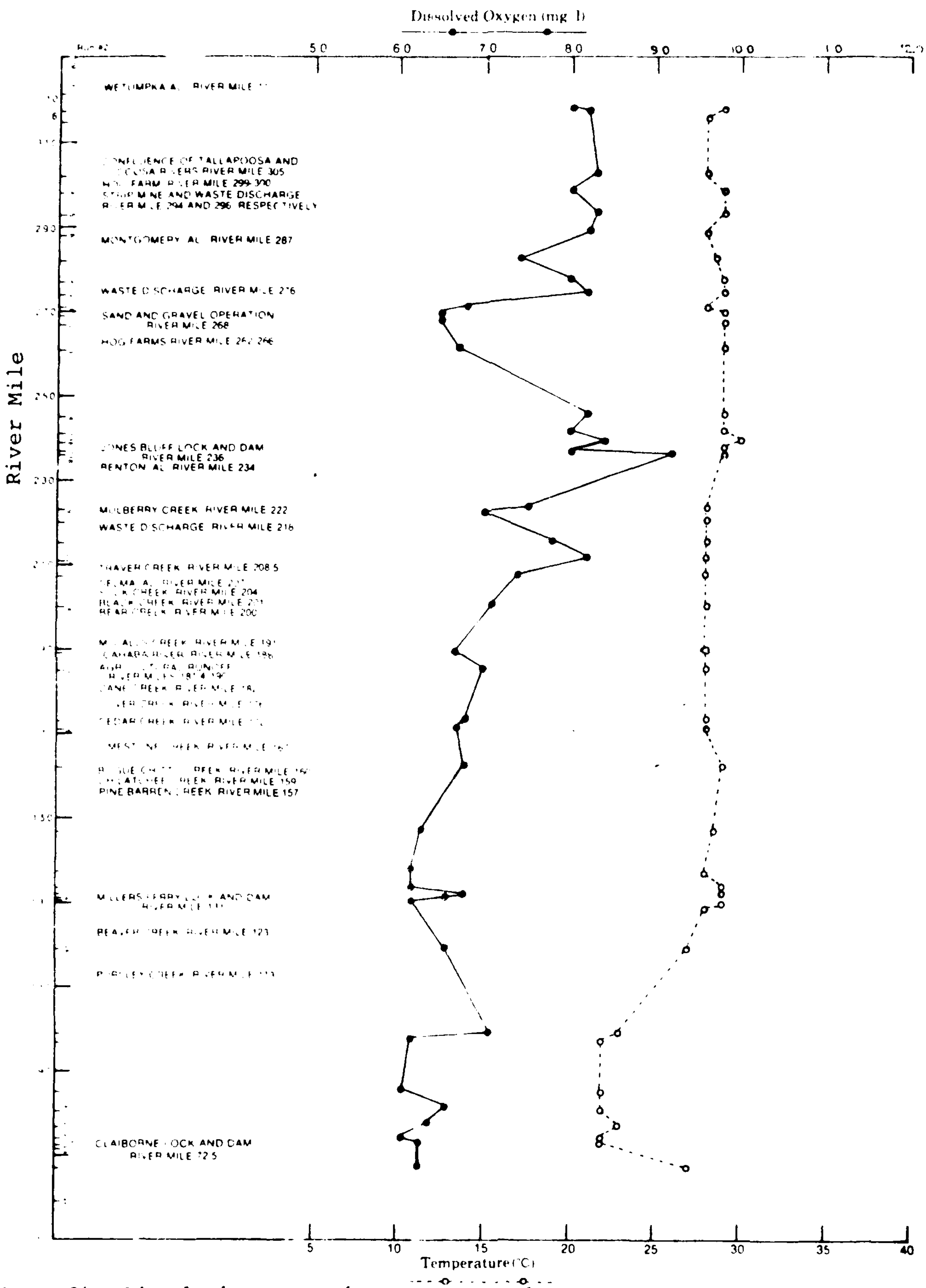


Figure 24.--Dissolved oxygen and temperature values versus distance at 46 Alabama-Coosa River system stations during the period August 29 through September 14, 1977.

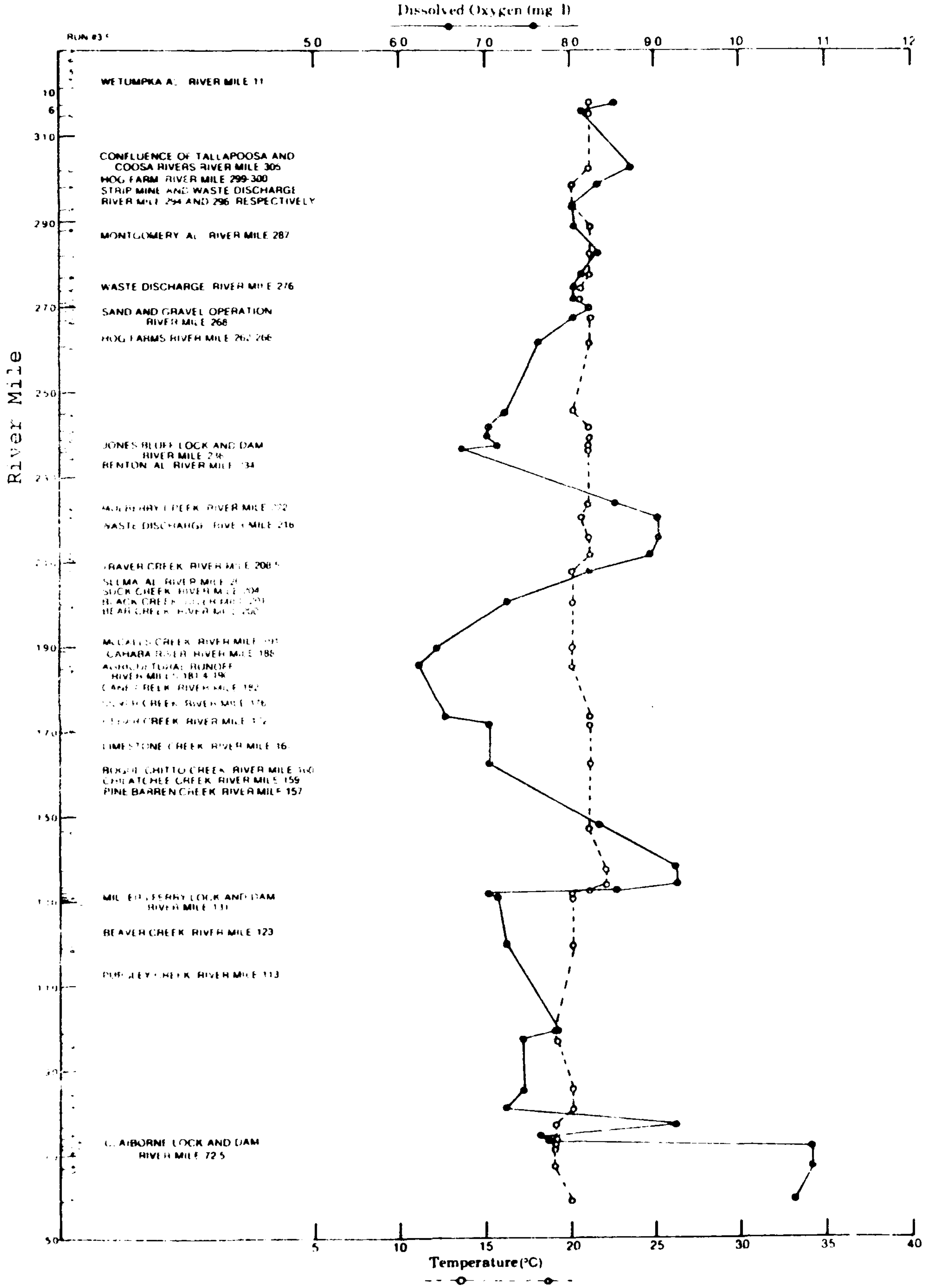


Figure 25.--Dissolved oxygen and temperature values versus distance at 46 Alabama-Coosa River system stations during the period September 19 through October 4, 1977.

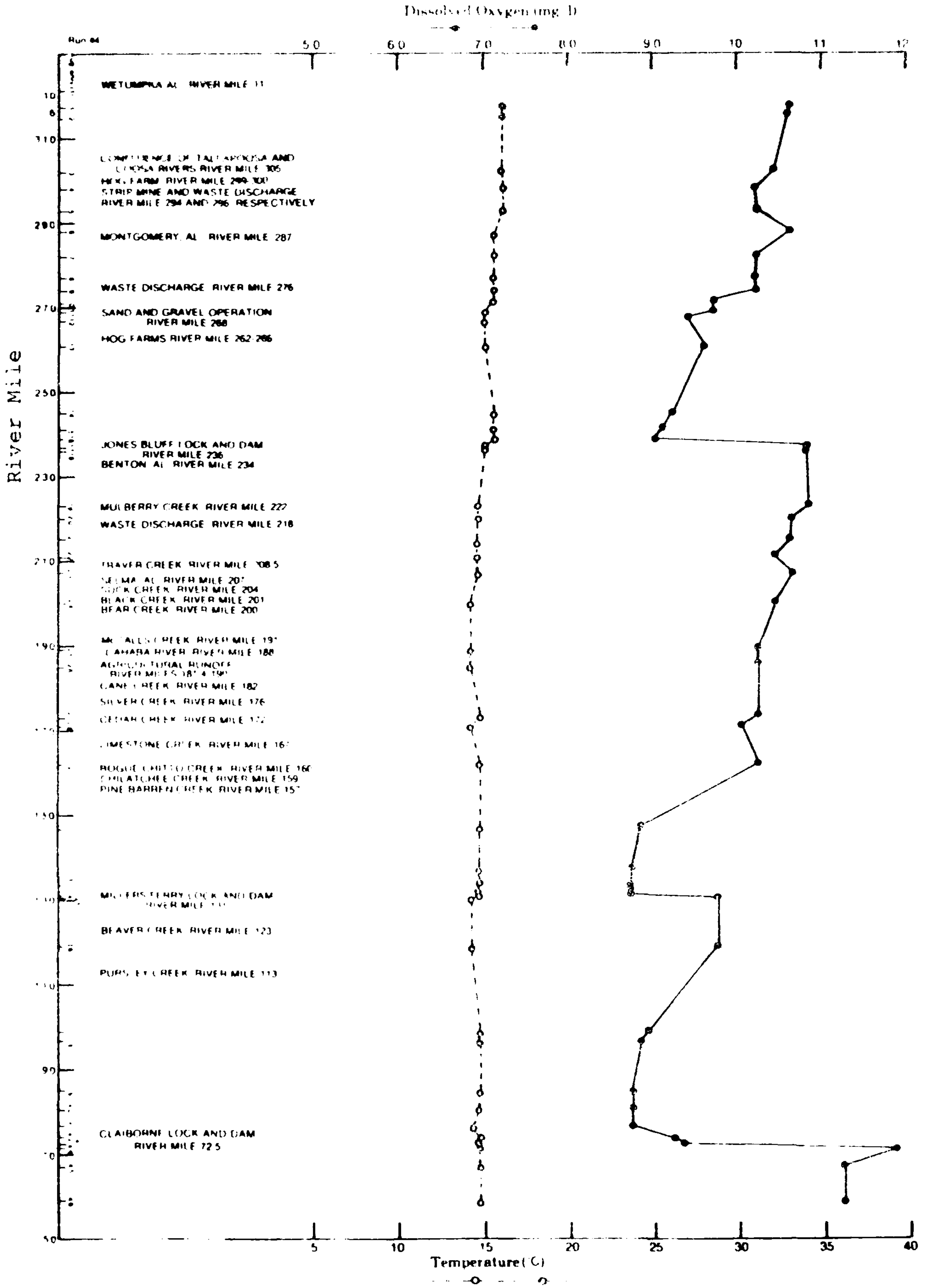


Figure 26.--Dissolved oxygen and temperature values versus distance at 46 Alabama-Coosa River system stations during the period October 11-25, 1977.

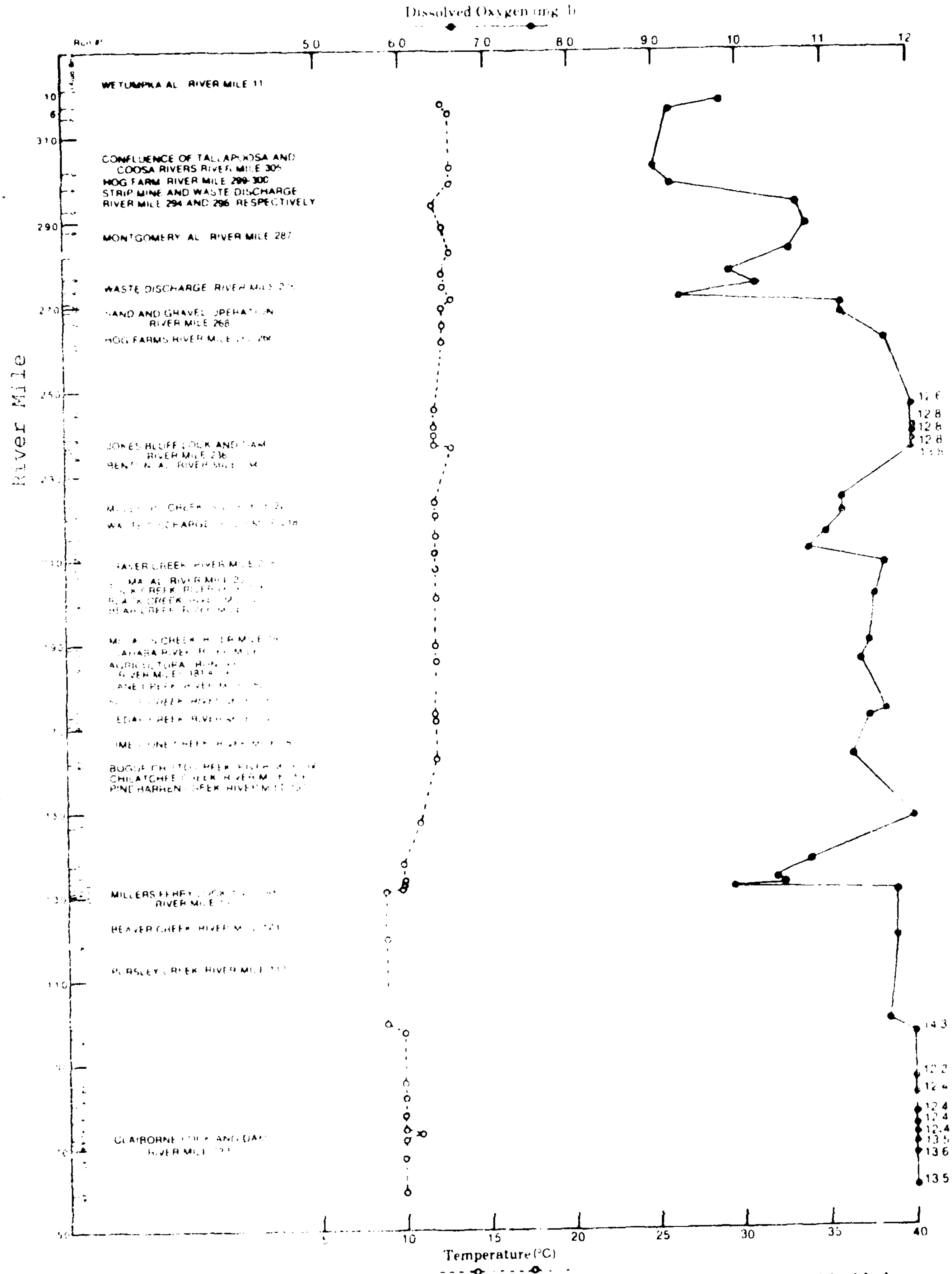


Figure 27.--Dissolved oxygen and temperature values versus distance at 46 Alabama-Coosa River system stations during the period October 31 through November 17, 1977

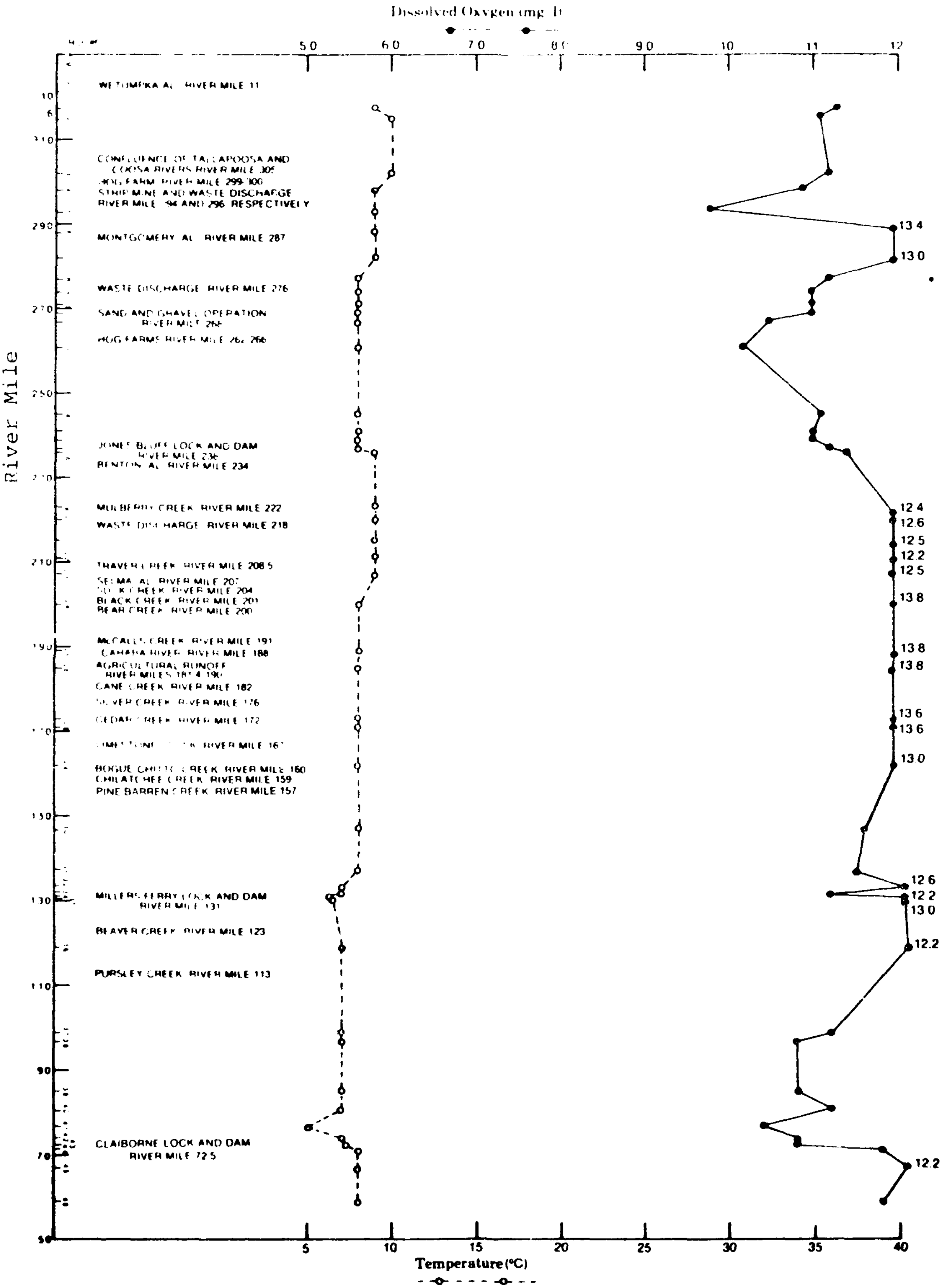


Figure 28.--Dissolved oxygen and temperature values versus distance at 46 Alabama-Coosa River system stations during the period November 21 through December 8, 1977.

Selected heavy-metal concentrations in water samples ranged from 5 to 15,000 micrograms per liter (μg/l) for total iron (figs. 29 through 34) during the August 9 through December 8, 1977, sampling period. Dissolved iron values exceeded the fish and wildlife criteria limits (300 μg/l) at stations 24 (November 8, 1977), 27 (November 9, 1977), 28 (September 27, 1977), 29 (November 9, 1977), 30 (November 10, 1977), 39 (December 8, 1977), 40 (August 24, 1977), and 45 (November 17, 1977). The dissolved iron ranged from 0 to 570 μg/l (figs. 29 through 34). The mean value was 94 μg/l.

Selected heavy-metal concentrations in water samples ranged from 3 to 320 μg/l for total manganese during the August 9 through December 8, 1977, sampling period. Dissolved manganese values exceeded the fish and wildlife criteria limits (.05 mg/l) at stations 15 (November 3, 1977), 23 (September 6, 1977), 40 and 41 (August 24, 1977). The mean concentration of manganese during the study was 16 μg/l and ranged from 0 to 80 μg/l.

The concentration of alkalinity as $CaCO_3$ ranged from a low of 3.3 mg/l on the Tallapoosa River to a high of 120 mg/l on the Alabama-Coosa River system. Total hardness concentration ranged from 4.0 mg/l on the Tallapoosa River to a high of 71 mg/l on the Alabama-Coosa River system. The concentration of total calcium ranged from 5.4 to 24 mg/l.

Analyses specifically for polychlorinated biphenyls (PCB's) were run on water samples collected at each of the 46 stations during the period August 29 to September 14, 1977. Aroclor 1242, Aroclor 1254, and Aroclor 1260 were the PCB residues specifically tested. These forms are used in the manufacture of electrical transformers, synthetic resins, vacuum pumps, and electrical capacitors. No traces of PCB residues were found in the water samples (table A-2).

The pH values at the 46 Alabama-Coosa River stations (figs. 35 through 40) ranged from 5.6 to 7.9 units throughout the study. Criteria limits (6-8 units) for pH were exceeded only at station 19 (October 17, 1977) which recorded a pH of 5.6 units. The pH ranged from a low of 5.6 at station 19 to 8.0 at station 46 (December 8, 1977).

The total suspended-solids concentrations at the 46 water-sampling sites (figs. 41 through 46) ranged from 2 to 90 mg/l (table A-1). Turbidity values ranged from 10 to 75 Nephelometric turbidity units (NTU). The silica concentrations of the water samples ranged from 1.9 to 6.1 mg/l. The total filterable solids residue (total dissolved solids) at the 46 water-sampling stations ranged from 27 to 160 mg/l. All of these concentration ranges occurred during the August 9 through December 8, 1977, sampling period.

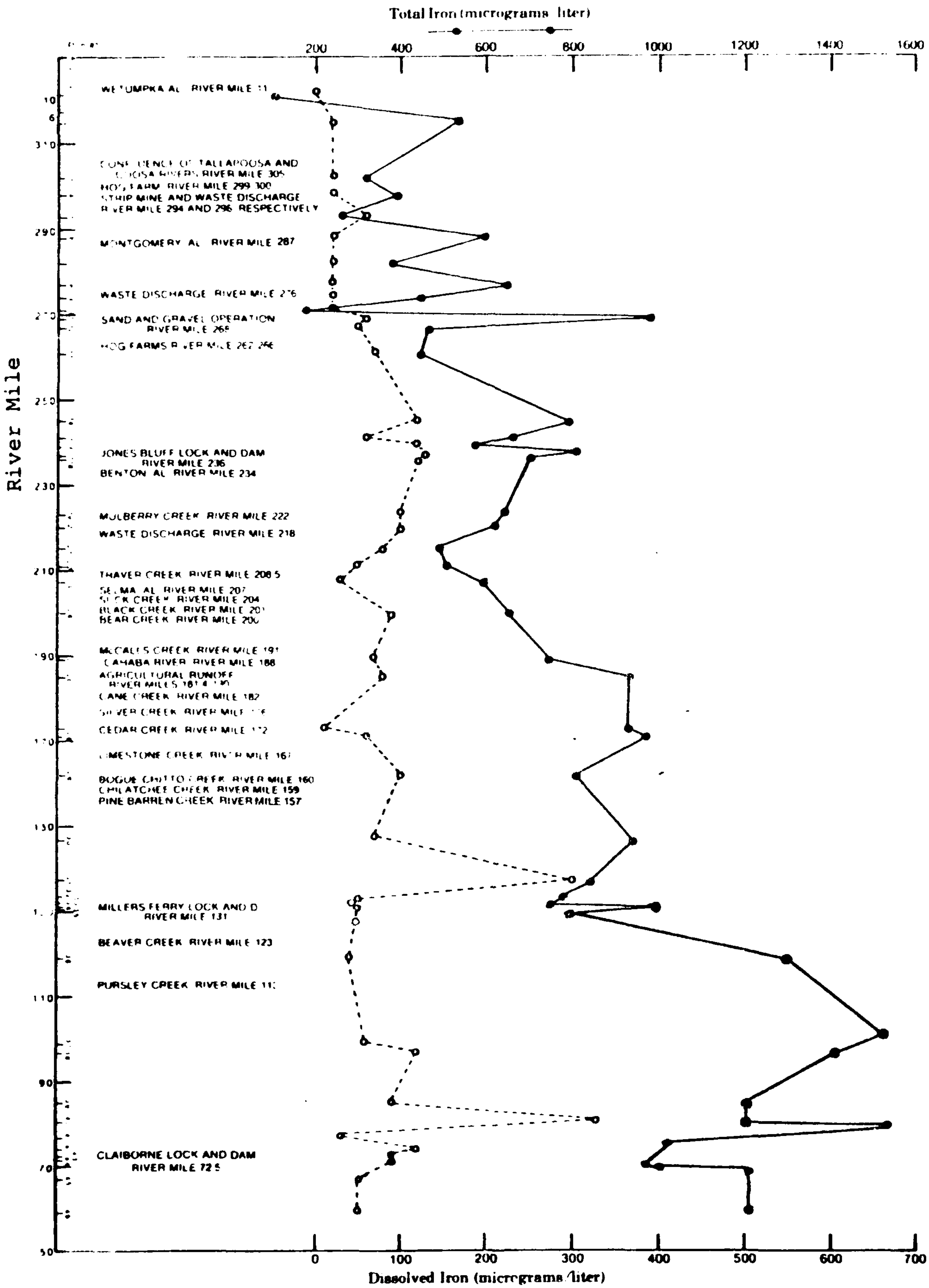


Figure 29.--Total iron and dissolved iron concentrations versus distance at 46 Alabama-Coosa River system stations during the period August 9-25, 1977.

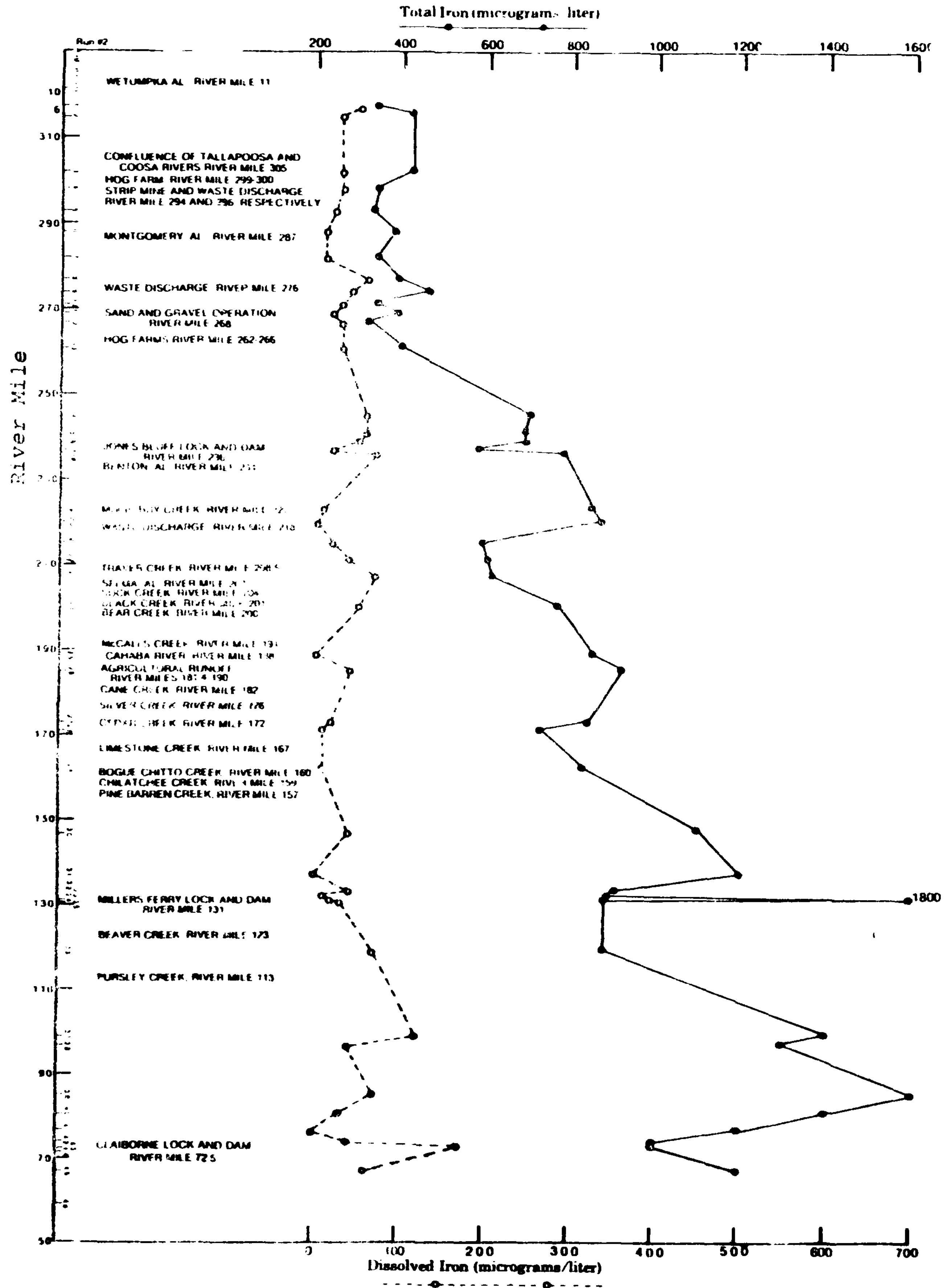


Figure 30.--Total iron and dissolved iron concentrations versus distance at 46 Alabama-Coosa River system stations during the period August 29 through September 14, 1977.

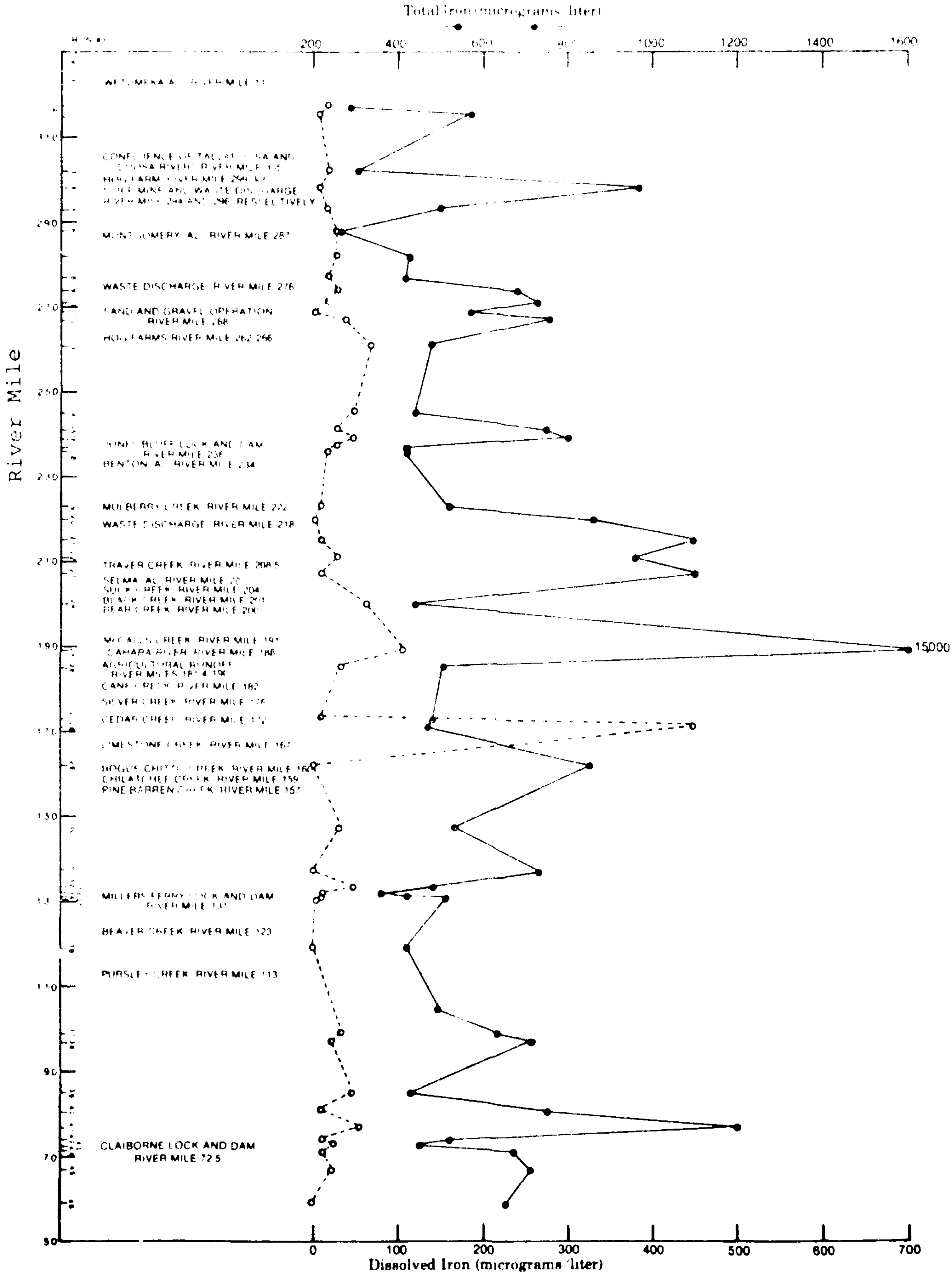


Figure 31.--Total iron and dissolved iron concentrations versus distance at 46 Alabama-Coosa River system stations during the period September 19 through October 4, 1977.

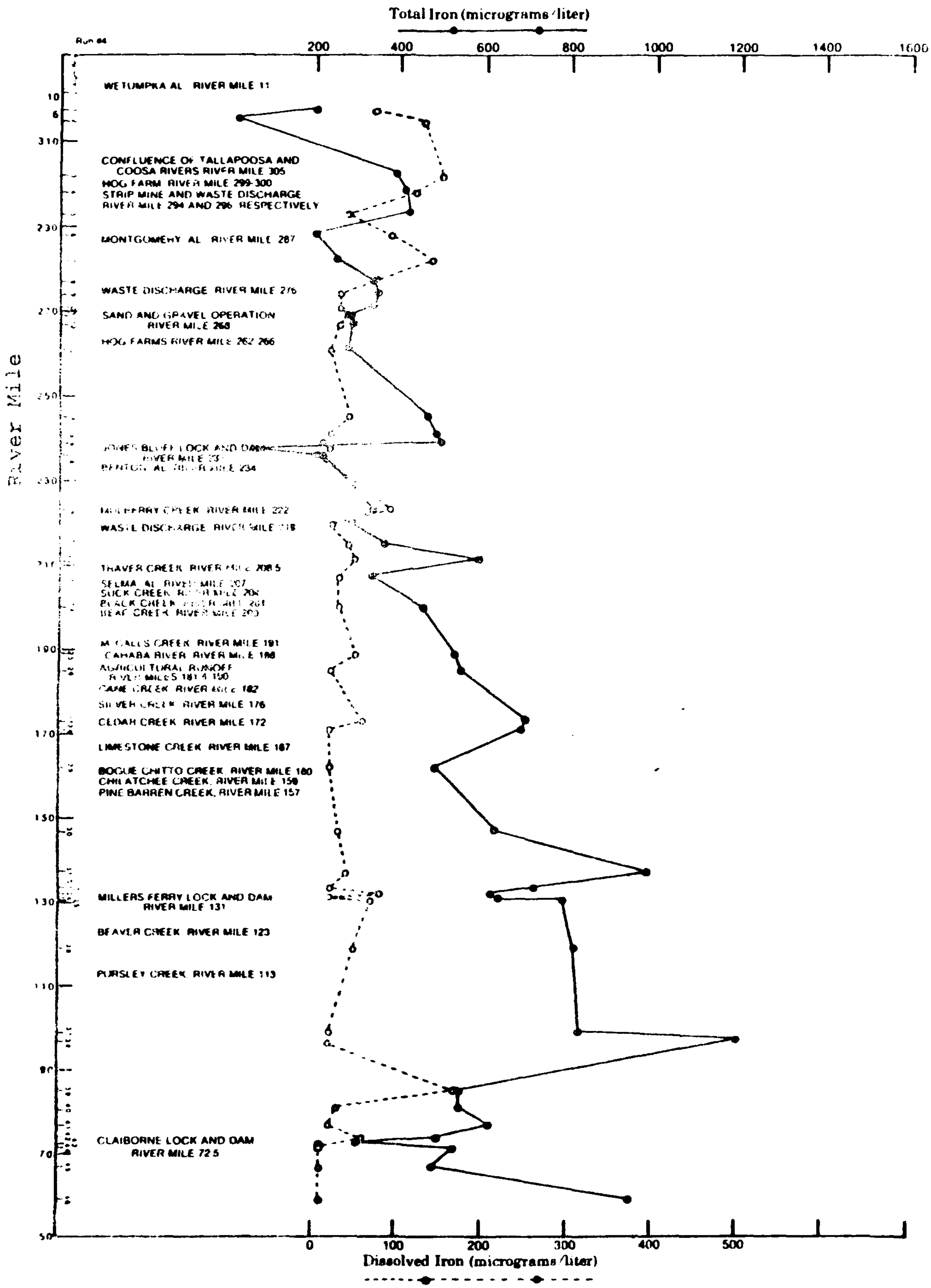


Figure 32.--Total iron and dissolved iron concentrations versus distance at 46 Alabama-Coosa River system stations during the period October 11-25, 1977.

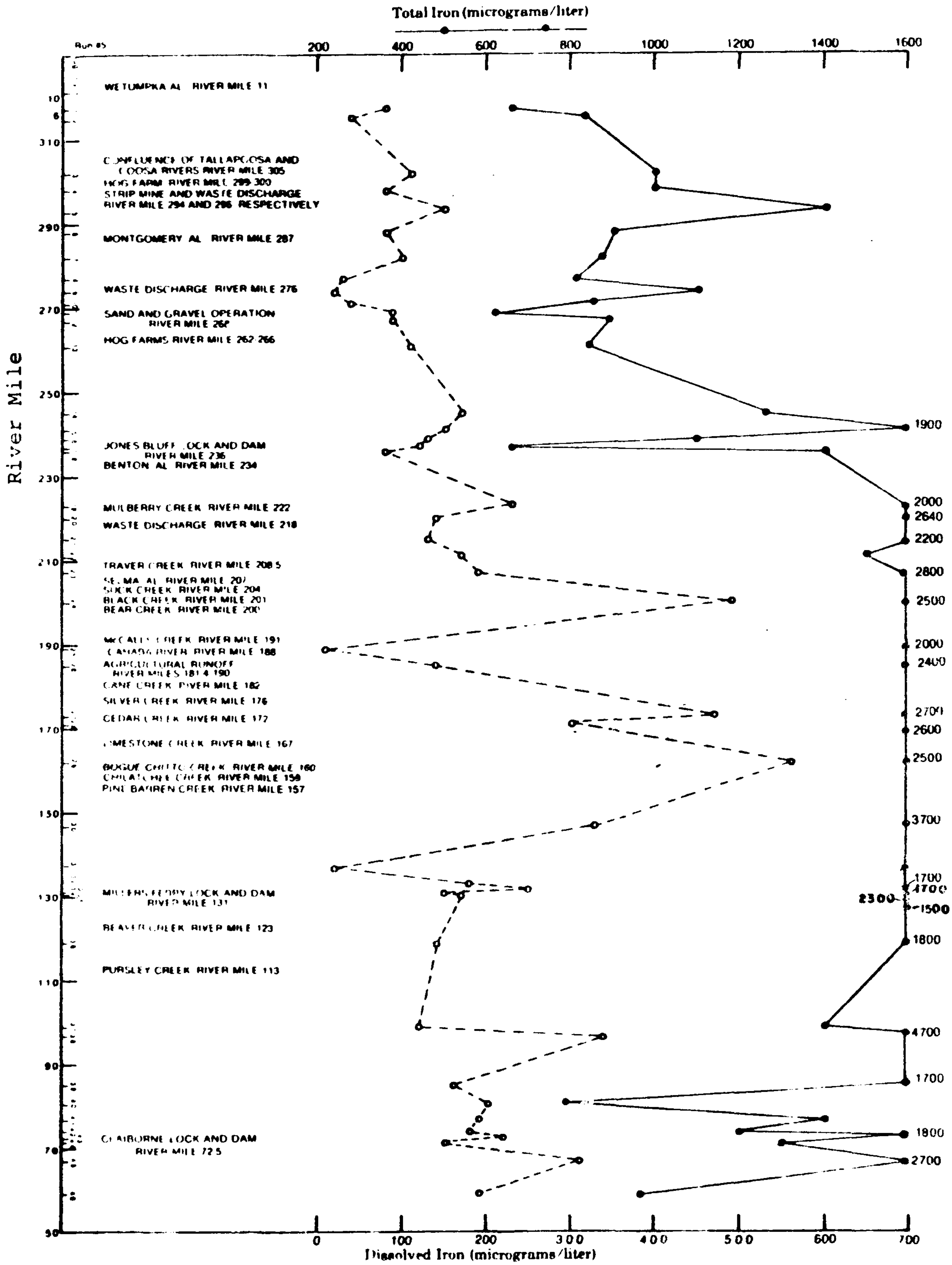


Figure 33.--Total iron and dissolved iron concentrations versus distance at 46 Alabama-Coosa River system stations during the period October 31 through November 17, 1977. 58

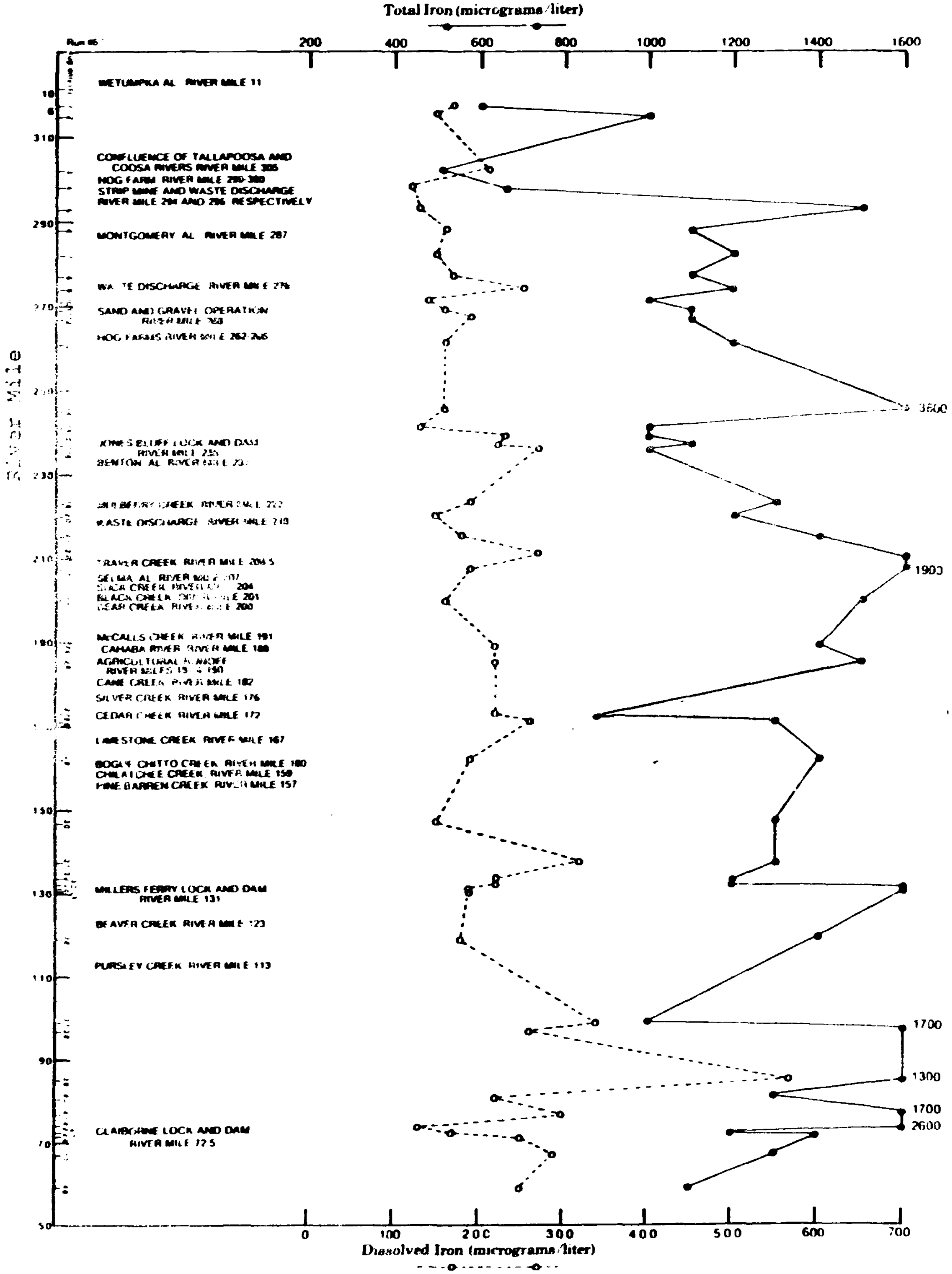


Figure 34.--Total iron and dissolved iron concentrations versus distance at 46 Alabama-Coosa River system stations during the period November 21 through December 8, 1977.

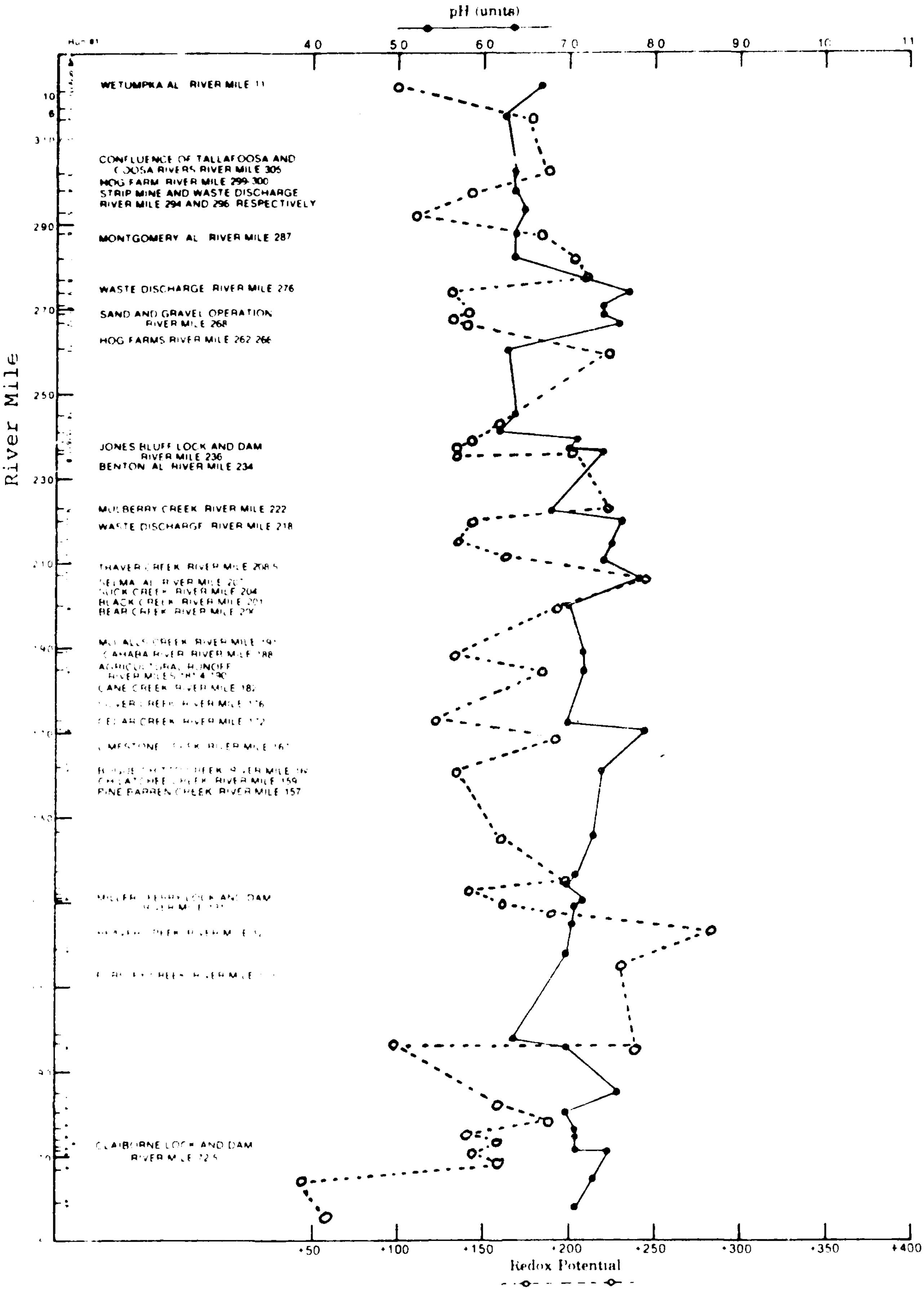


Figure 35.--Redox potential and pH values versus distance at 46 Alabama-Coosa River system stations during the period August 9-25, 1977.

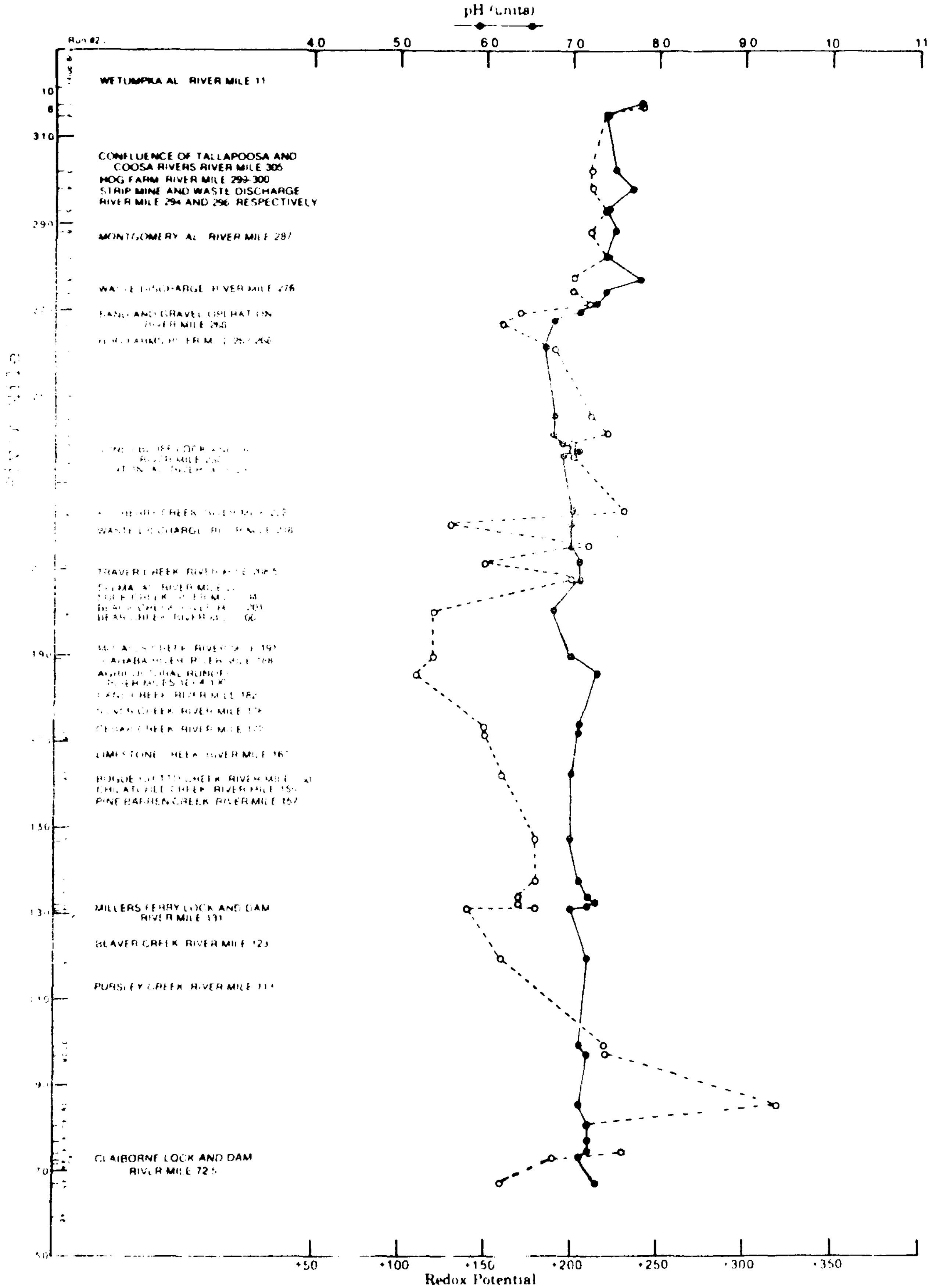


Figure 36.--Redox potential and pH values versus distance at 46 Alabama-Coosa River system stations during the period August 29 through September 14, 1977.

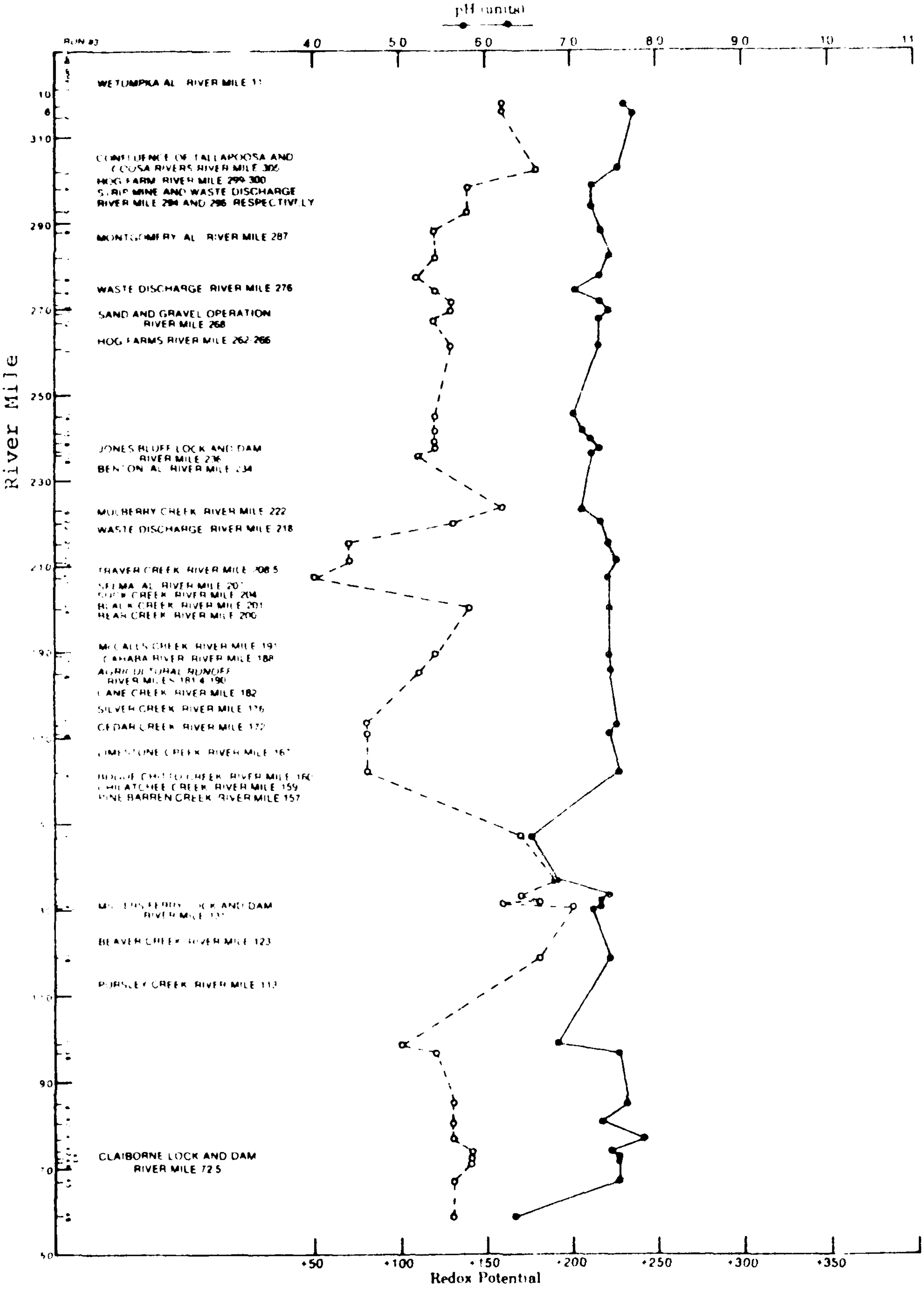


Figure 37.--Redox potential and pH values versus distance at 46 Alabama-Coosa River system stations during the period September 19 through October 4, 1977.

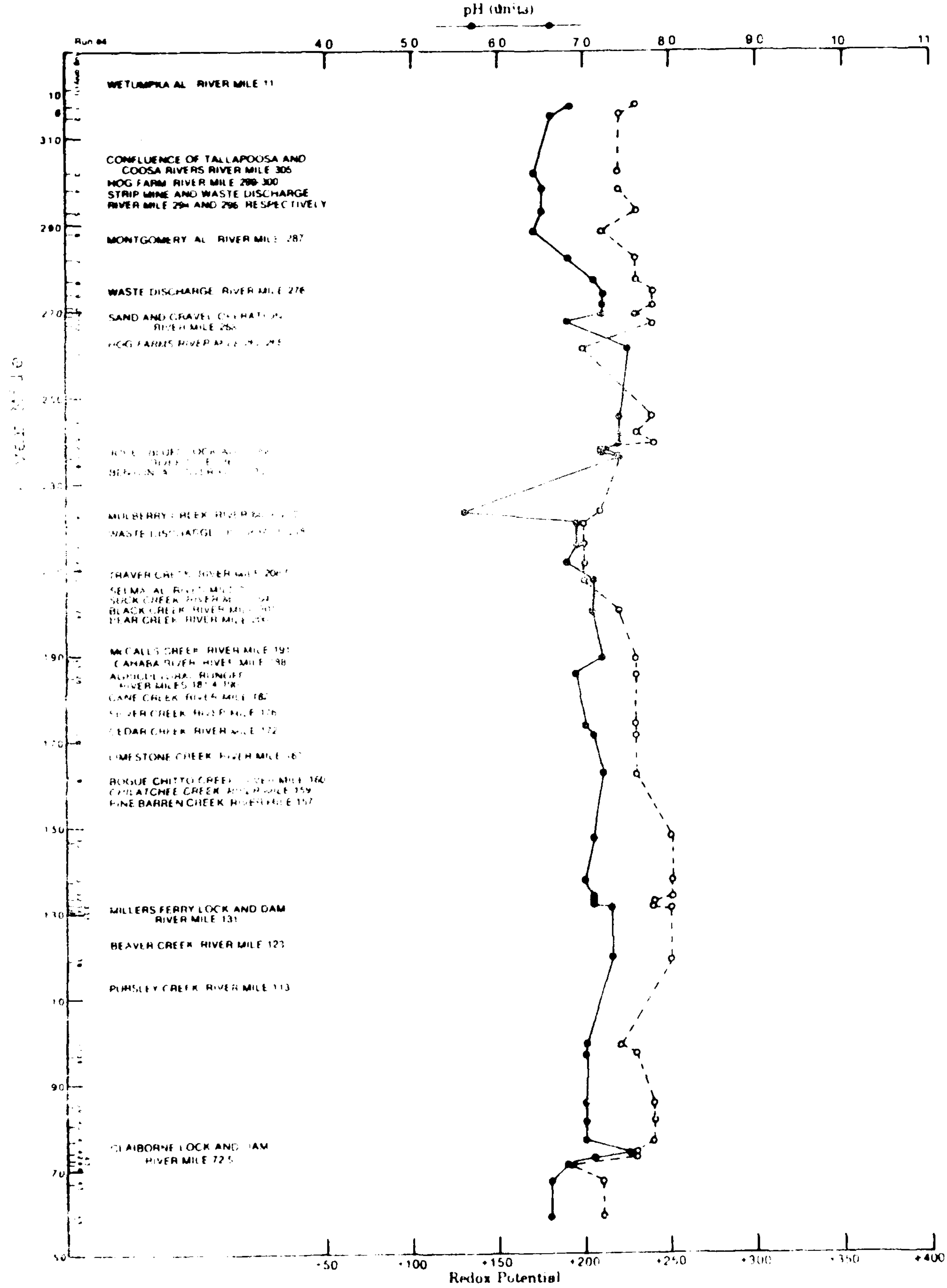


Figure 34.--Redox potential and pH values versus distance at 46 Alabama-Coosa River system stations during the period October 11-25, 1977.

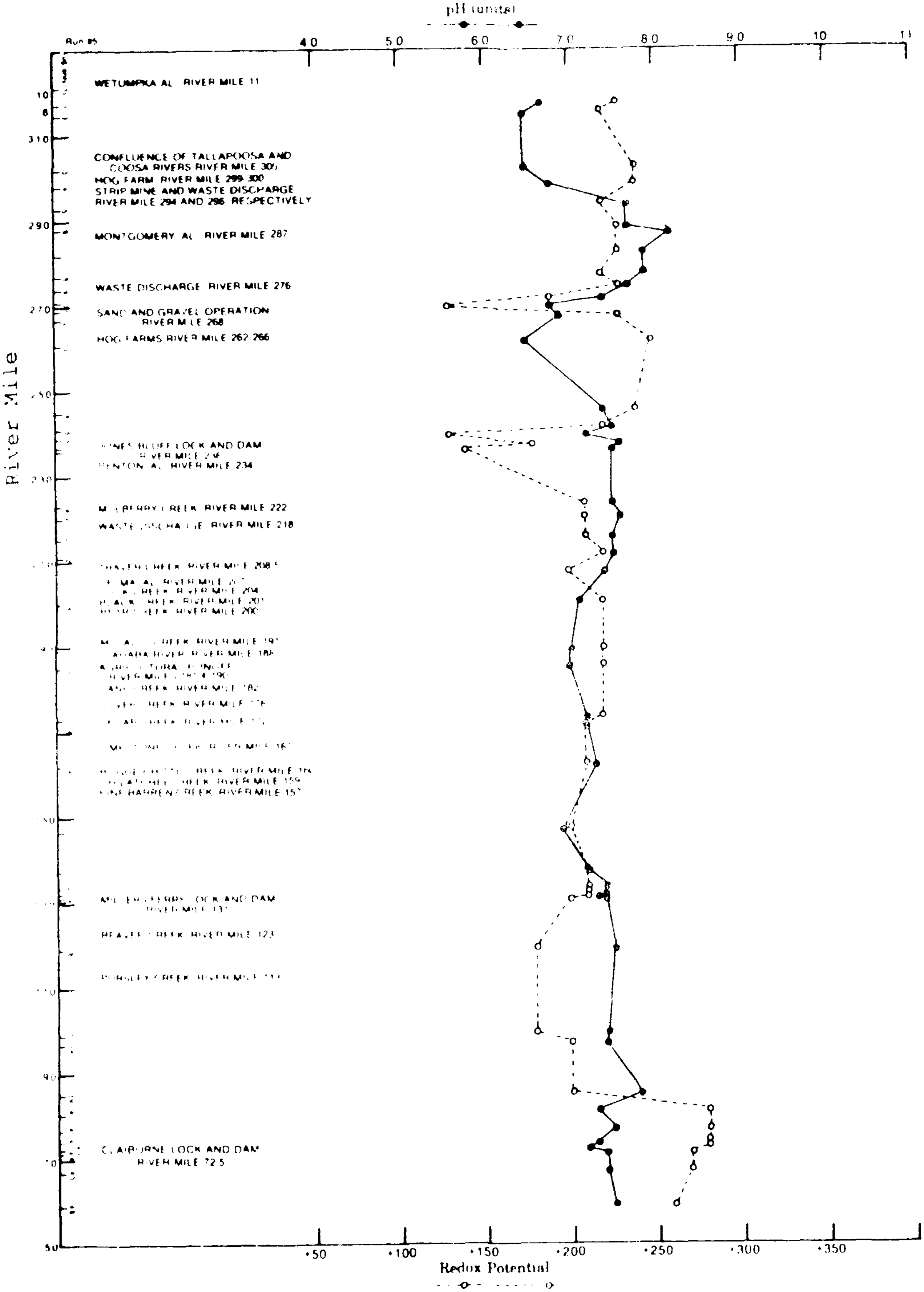
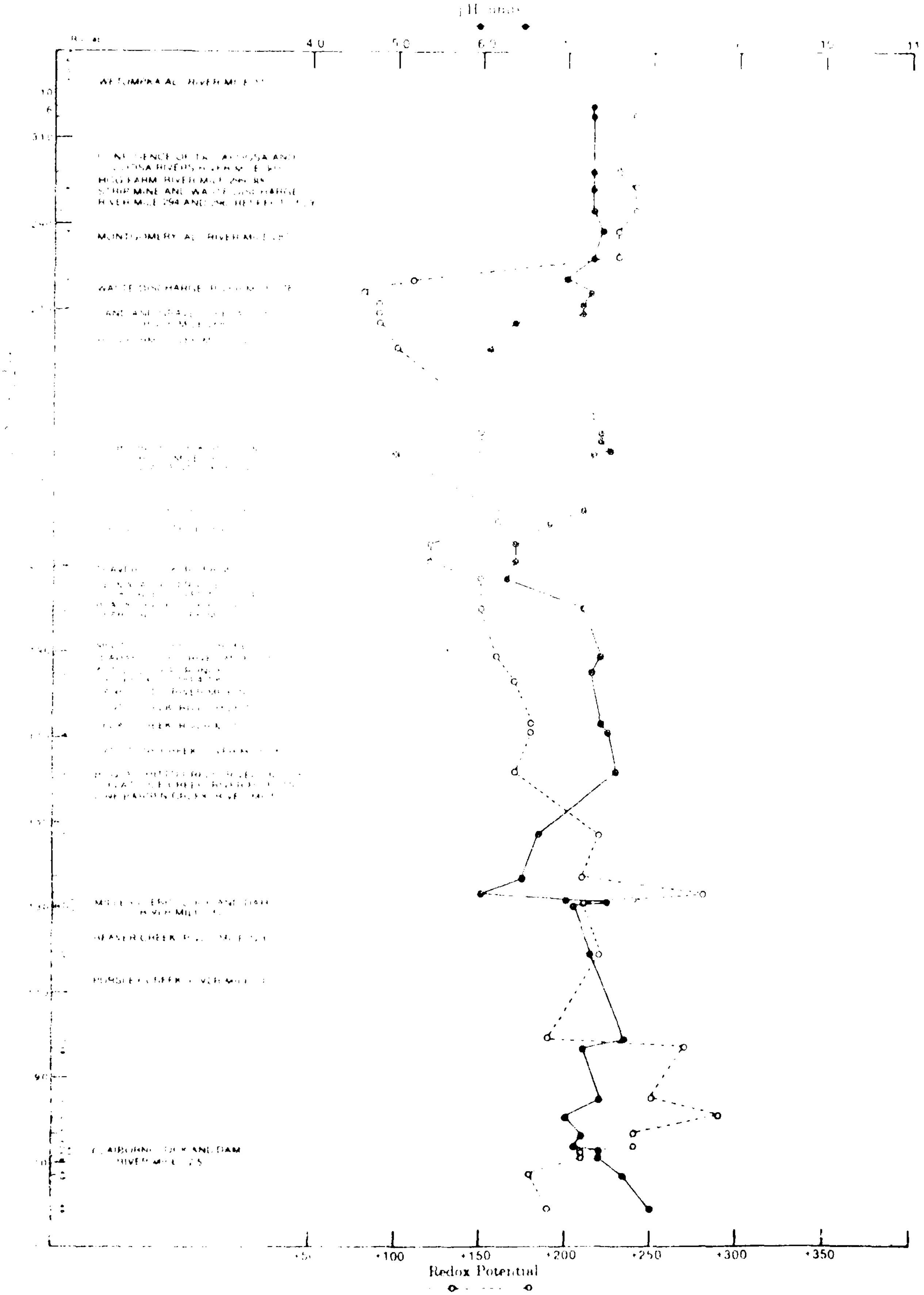


Figure 39.--Redox potential and pH values versus distance at 46 Alabama-Coosa River system stations during the period October 31 through November 17, 1977.



[illegible] Redox potential and pH values versus distance at 46 Alabama-Coosa River system stations during the period November 21 through December 8, 1977.

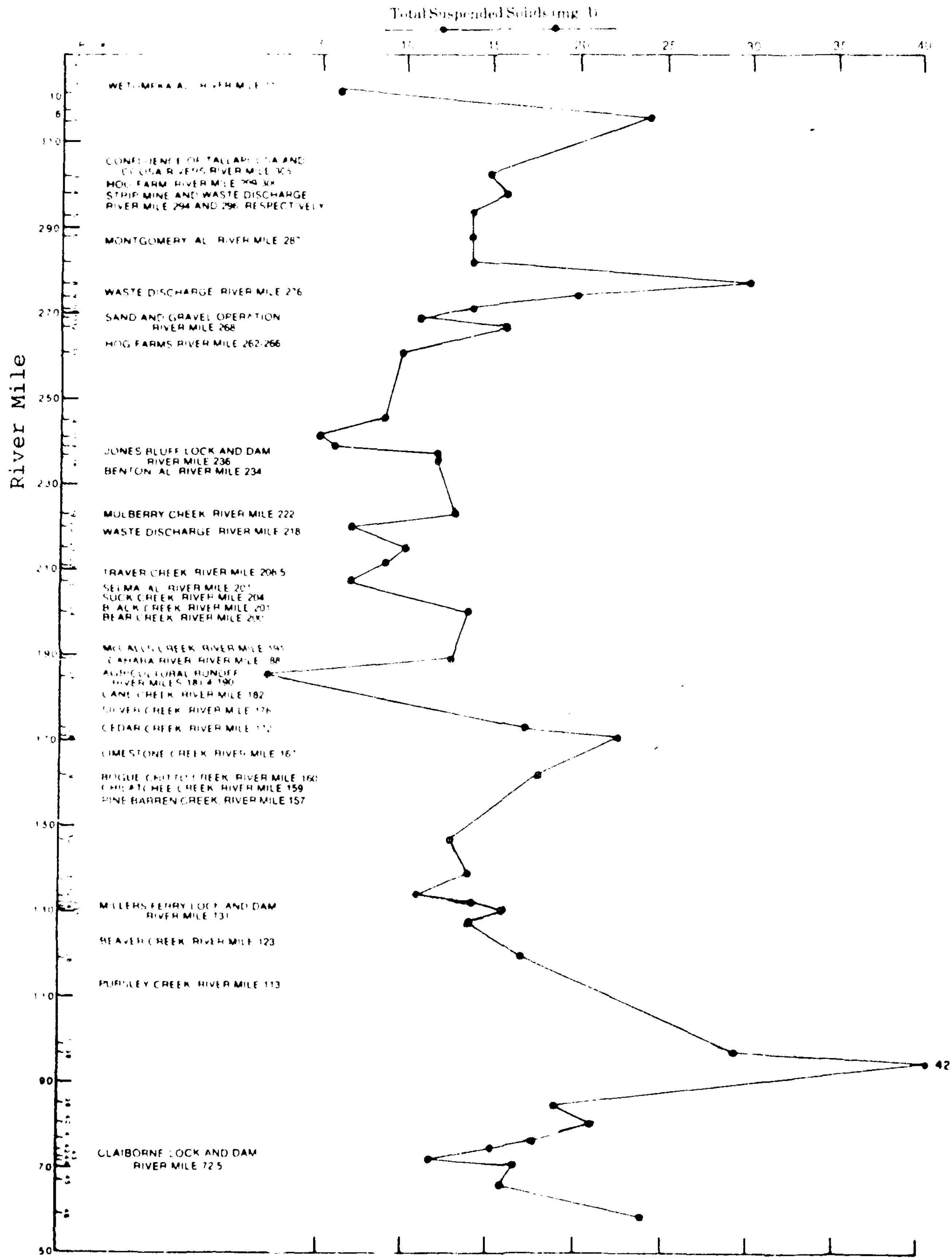


Figure 41.--Total suspended solids concentrations versus distance at 46 Alabama-Coosa River system stations during the period August 9-25, 1977.

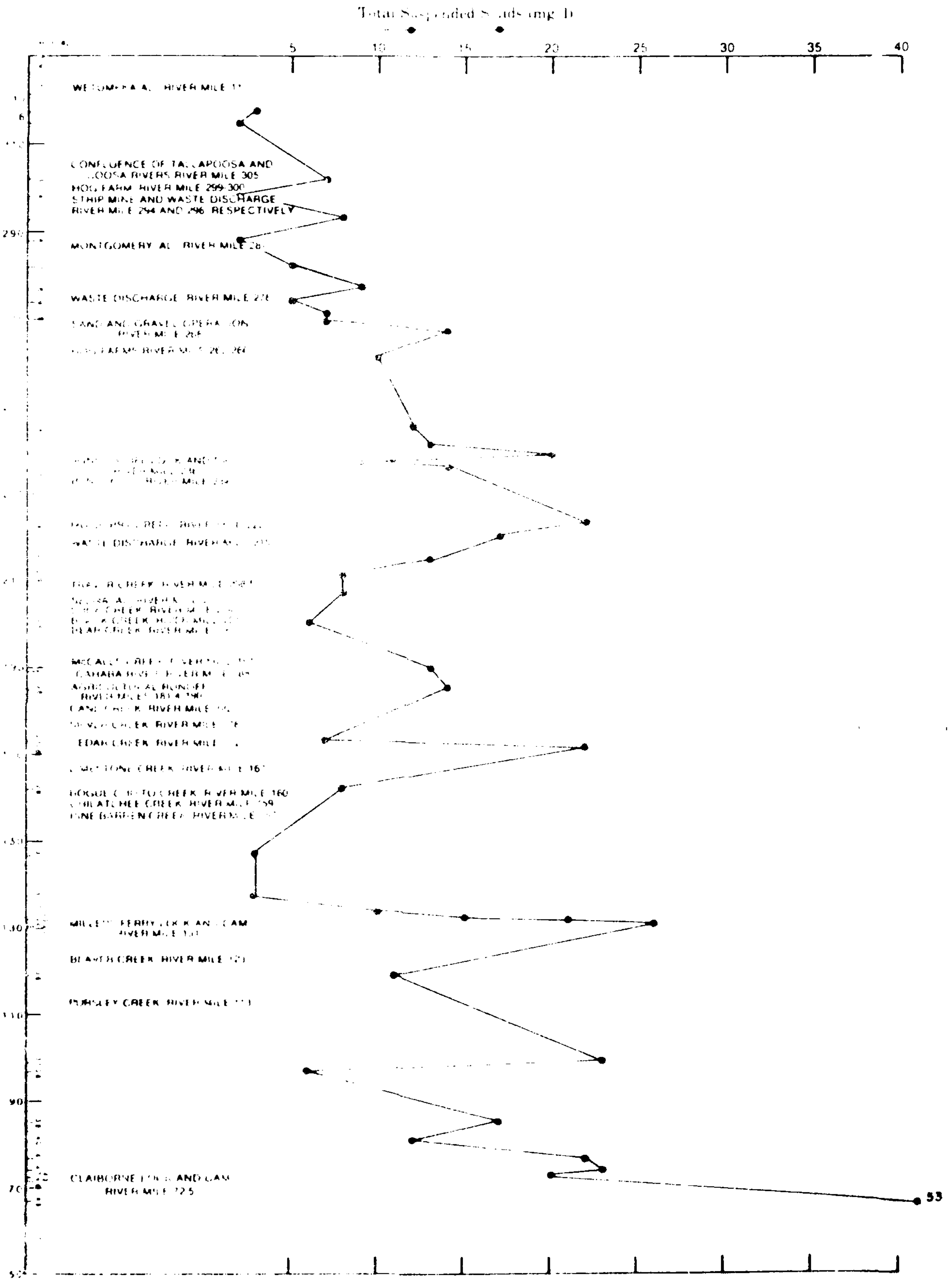


Figure 42.--Total suspended solids concentrations versus distance at 46 Alabama-Coosa River system stations during the period August 29 through September 14, 1977.

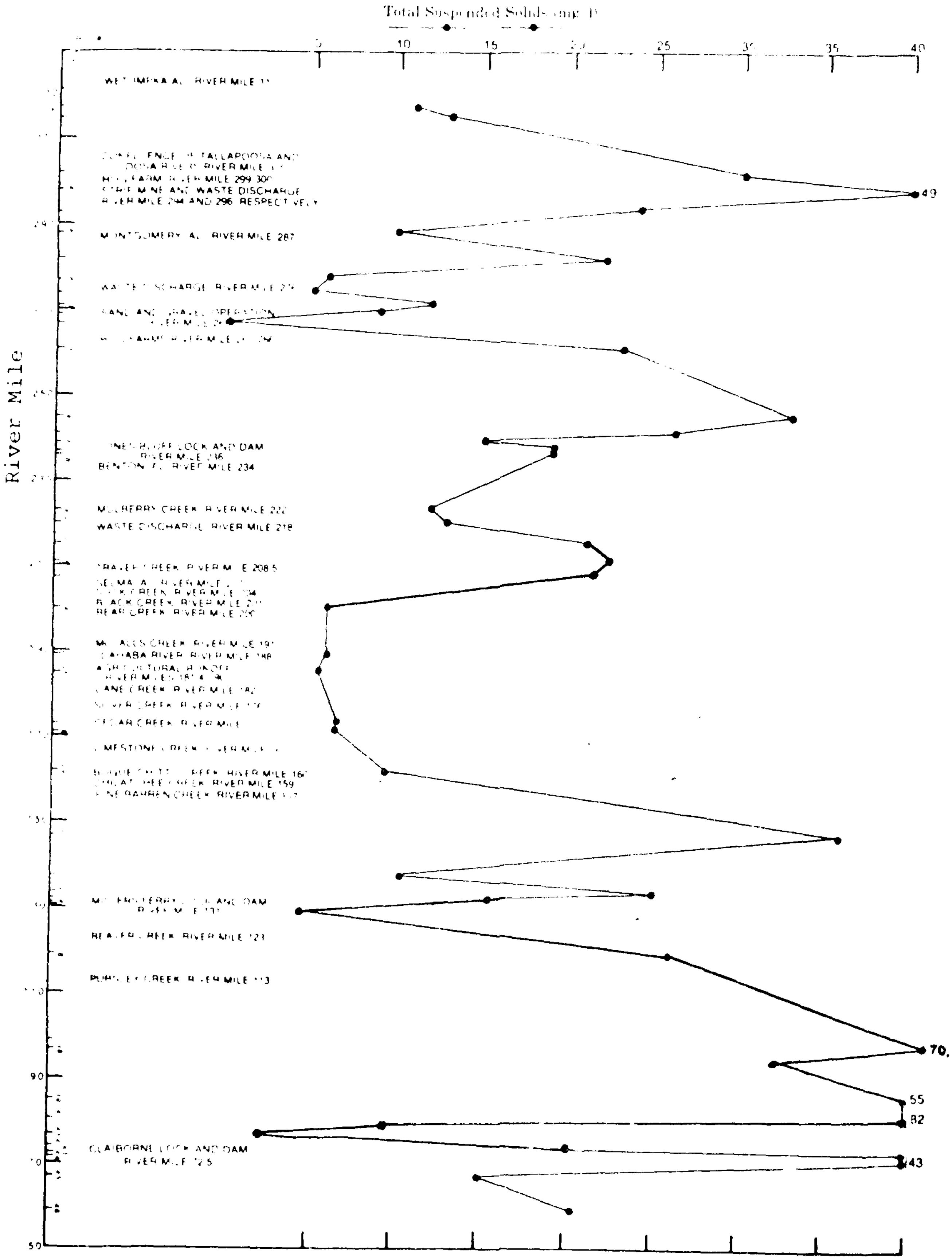


Figure 43.--Total suspended solids concentrations versus distance at 46 Alabama-Coosa River stations during the period September 19 through October 4, 1977.

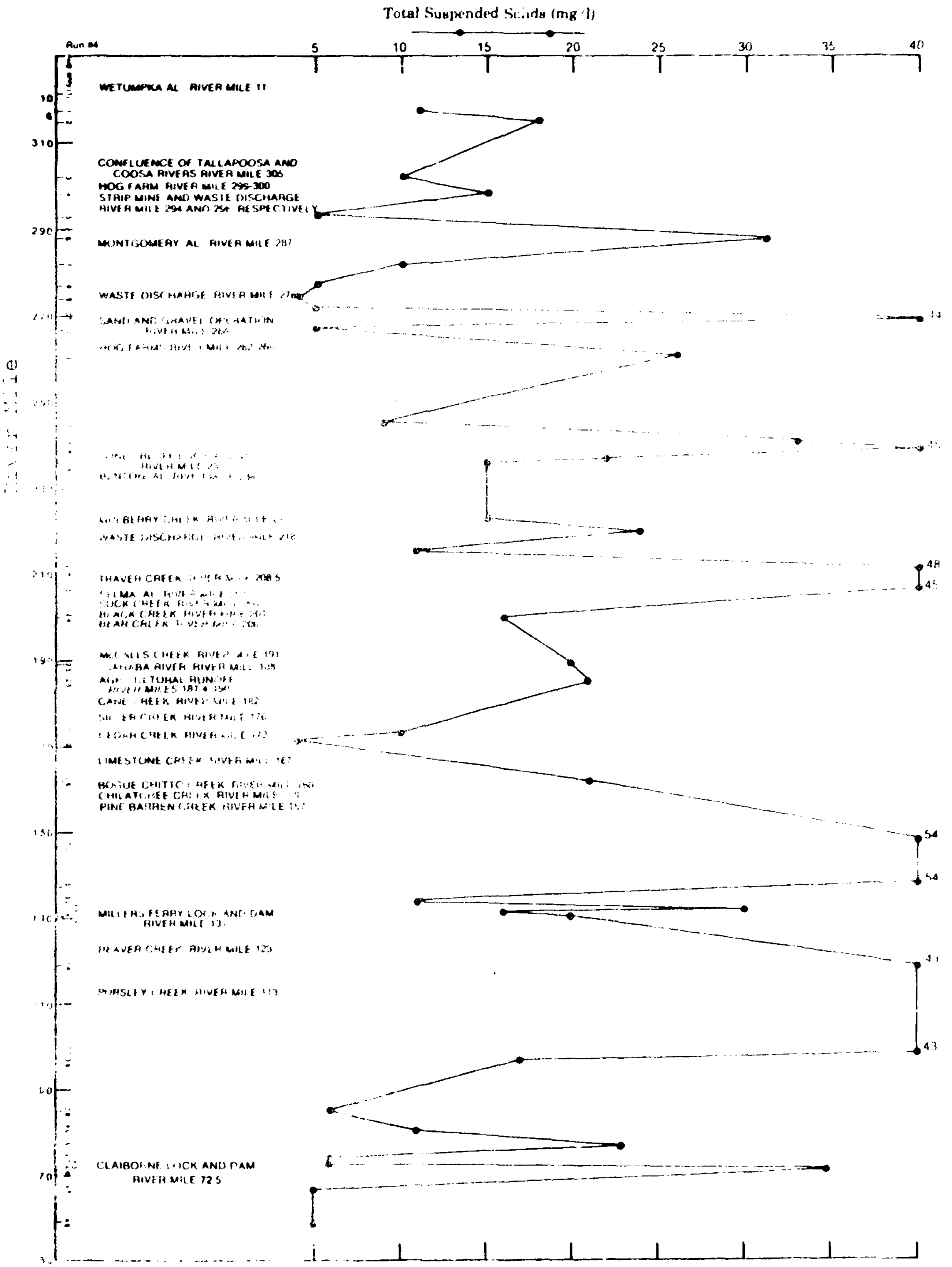


Figure 44.--Total suspended solids concentrations versus distance at 46 Alabama-Coosa River system stations during the period October 11-25, 1977.

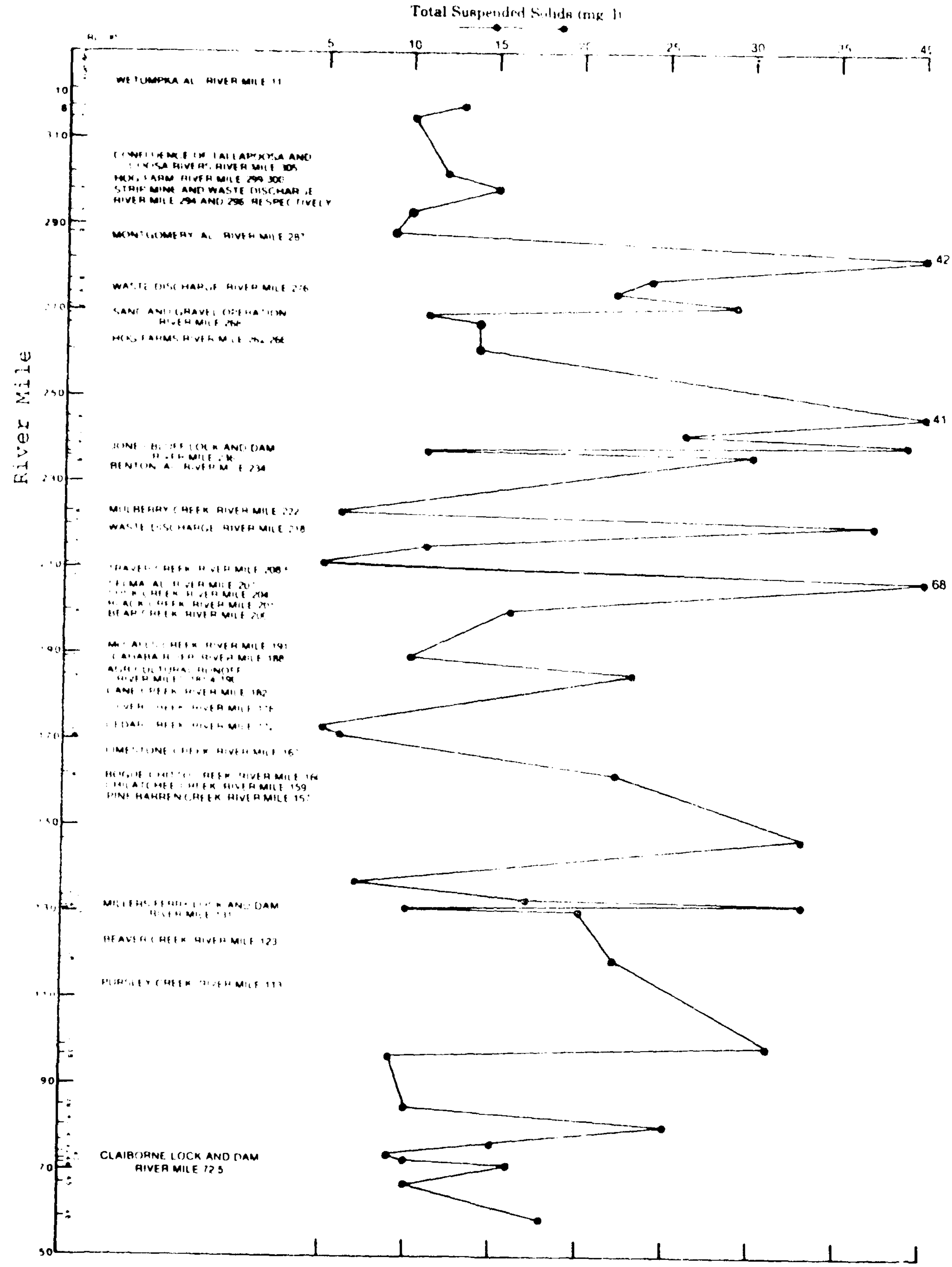


Figure 45.--Total suspended solids concentrations versus distance at 46 Alabama-Coosa River system stations during the period October 31 through November 17, 1977.

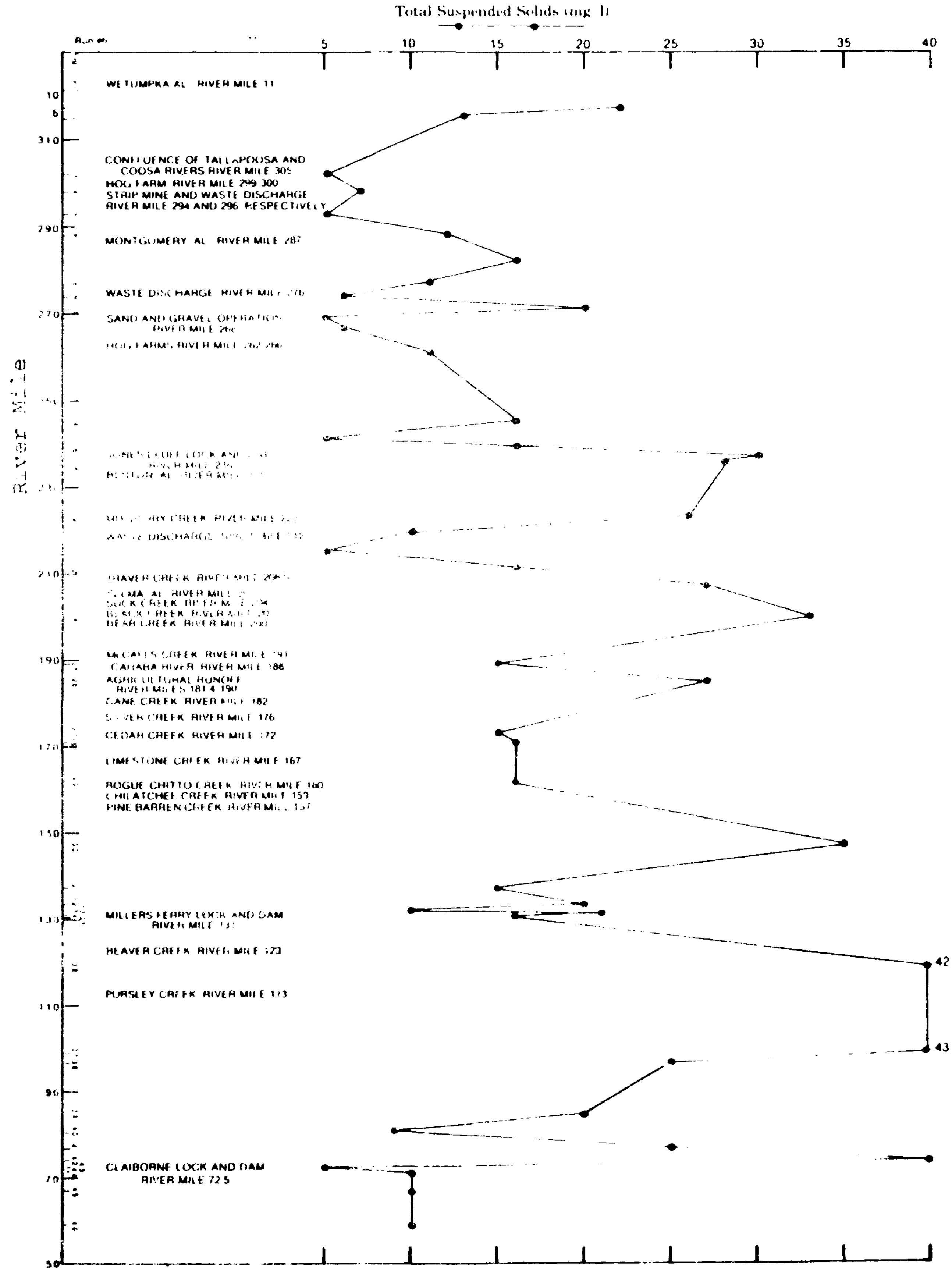


Figure 46.--Total suspended solids concentrations versus distance at 46 Alabama-Coosa River system stations during the period November 21 through December 8, 1977.

2. Sediment Parameters

Sediment samples were collected at all 46 stations during the second run with heavy metals and selected nutrient analysis entered into the EPA STORET system (table 4). At stations 7, 17, 19, 31, 36, 42, and 43, mechanical analyses of these samples were performed (table 7).

The heavy metals analyzed from the extracted sediments during the study included arsenic, cadmium, chromium, copper, iron, lead, magnesium, manganese, mercury, nickel, and zinc. These metals are reported in micrograms per gram (μg/g). The heavy-metals concentration data indicated areas of high total magnesium (2000 μg/g), high total iron (32,000 μg/g), and high total manganese (2300 μg/g), as shown in table 8. Sediments were analyzed only once; therefore, no ranges are given. The concentrations of the remaining metal parameters fell within normal background limits.

Analyses for 29 pesticide species (table 8) were performed on sediment samples; only 11 species were detected. Of those residues detected, Aldrin, DDT, and two PCB's (Aroclor 1254 and 1260) occurred in the highest concentrations. Aldrin concentrations reached a high (814 μg/kg) at station 17, which is immediately above Jones Bluff Lock and Dam. Polychlorinated biphenyls (Aroclor 1260 and Aroclor 1254) were detected at a number of sediment stations and reached their highest concentrations at stations 13 (82.19 μg/kg) and 17 (32.38 μg/kg). Sediment values for DDT for all sites ranged from 0.17 to 6.59 μg/kg.

3. Other Parameters

Chlorophylls *a*, *b* and *c* samples were collected and analyzed over a 5-month period (table A-1). The ranges of concentration for chlorophylls *a*, *b* and *c*, respectively, were 2.0 to 36 μg/1, .0 to 36 μg/1 and .0 to 120 μg/1 (table A-1). These are the only baseline data for chlorophyll available for the Alabama-Coosa Rivers for the study area. Therefore, conclusions cannot be drawn at this time as to the natural levels in these rivers. The highest chlorophyll *a* value (36 μg/1) occurred at station 32 (September 28, 1977). The highest chlorophyll *b* value (36 μg/1) and the highest chlorophyll *c* value (120 μg/1) occurred at station 16 (August 16, 1977).

Total carotenoid pigments were analyzed in samples collected during each sampling run and ranged from .1 to 64 μg/1 (table 9).

Algal growth potential tests were performed on water samples taken from each station. Data obtained from these tests are contained in table 10. The highest algal dry weight occurred in samples collected at stations 28 (10.74 mg/1) and 29 (12.80 mg/1). The transparency values for the river samples ranged from 0.5 to 1.15 meters for all 46 sampling stations (table A-1).

Table 7.--Mechanical analyses of sediment samples from the Alabama-Coosa Rivers, August 29 through September 14, 1977

(Percent material retained on indicated sieve size)

U.S. Standard Sieve Sizes	Station numbers						
	7	17	19	31	36	42	46
5	5.20	.00	.70	.30	.00	32.50	.40
7	2.10	.00	.30	.10	.00	8.40	.06
10	1.40	.00	.20	1.10	.00	8.50	.50
18	3.70	.10	13.00	4.50	.10	22.50	6.[illegible]
25	2.40	.10	31.80	6.70	.09	13.50	9.95
35	4.60	.25	43.60	18.80	.10	11.10	17.97
45	10.30	.20	8.90	28.90	.75	2.10	20.72
60	26.90	.70	.60	26.40	1.20	.60	18.65
80	15.00	2.50	.20	10.70	7.80	.02	22.17
120	5.10	3.90	.00	1.60	20.20	.01	2.14
170	3.10	4.40	.06	.20	17.60	.01	.30
230	3.40	9.70	.02	.10	24.30	.01	.09
PAN	16.80	77.85	.03	.40	27.85	.02	.03
Totals	100.00	99.90	100.07	99.80	99.99	99.27	99.88

Table 8.--Heavy-metal and pesticide concentrations in sediment samples from the Alabama-Coosa River system from August 29 through September 14, 1977

Station number	Date	Micrograms per gram												Milligrams per kilogram				Grams per kilogram
		Total Arsenic	Total Cadmium	Total Chromium	Total Copper	Total Lead	Total Mercury	Total Nickel	Total Zinc	Total Magnesium	Total Iron	Total Manganese	Chemical Oxygen Demand	Total PO_4 as P	Total Kjeldahl Nitrogen	Oil and Grease	Volatile Solids	Total Organic Carbon
1	8/29/77	[illegible]	[illegible]	50	40	[illegible]		50	[illegible]	[illegible]	11,000	[illegible]	93,000	3.6	3.7	280	3,590	4
2	8/29/77	[illegible]	10	50	30	[illegible]	2	50	[illegible]	800	[illegible]	410	110,000	1.7	7	250	3,240	6
3	8/29/77	[illegible]	[illegible]	50	[illegible]	[illegible]	[illegible]	50	60	210	4,200	560	95,000	4	4	340	3,070	[illegible]
4	8/29/77	[illegible]	[illegible]	50	[illegible]	50	[illegible]	[illegible]	[illegible]	1,400	14,000	880	130,000	[illegible]	[illegible]	170	23,700	[illegible]
5	8/29/77		[illegible]	50	[illegible]	50		50	60	200	3,100	240	190,000	2.9	6	110	4,370	2.0
6	8/30/77	[illegible]	<10	50	20	<50	[illegible]	50	40	100	2,200	250	92,000	1.3	5	[illegible]	2,150	2.0
7	8/30/77	2	<10	50	20	<50	2	<50	50	1,600	150	340	620,000	1.4	2.2	130	12,600	[illegible]
8	8/30/77	2	<10	50	20	<50	3	50	60	1,100	12,000	300	700,000	5.9	1.2	190	19,200	1.2
9	8/30/77	11	<10	50	20	<50	2	50	190	2,000	30,000	2,000	920,000	27	8	260	60,700	3.0
10	8/31/77	10	10	50	20	50	2	<50	140	2,000	32,000	2,300	90,000	38	2.7	140	73,900	[illegible]
11	8/31/77	2	10	50	20	50	[illegible]	50	50	1,000	12,000	310	350,000	5.3	9	94	23,300	1.1
12	8/31/77	3	10	<50	20	50	2	<50	[illegible]	660	11,000	710	240,000	9.3	1	110	10,100	[illegible]
13	8/31/77	9	<10	50	20	50	[illegible]	[illegible]	140	1,900	30,000	1,900	1,300,000	40	1.8	280	60,300	4.0
14	9/01/77	3	<10	50	[illegible]	50	[illegible]	[illegible]	50	820	11,000	560	530,000	27	5	120	15,600	1.6
15	9/01/77		10	50	20	50	2		40	530	6,200	250	180,000	3.9	2	46	7,420	6
16	9/01/77	8	<10	50	30	<50	2	<50	110	1,700	24,000	1,700	540,000	6.4	2.6	39	24,100	3.9
17	9/01/77	5	10	50	20	50	2	50	80	1,300	[illegible]	700	1,600,000	[illegible]	1.7	78	[illegible]	[illegible]
18	9/01/77	2	10	50	20	<50	2	<50	40	610	[illegible]	530	120	9.4	2	96	6,850	8
19	9/06/77	1	<10	<50	20	50	2	<50	20	50	2,400	370	36,000	8.6	3	69	1,070	1
20	9/06/77	1	10	<50	20	50	ND	50	110	170	3,900	630	39,000	9.1	2	75	2,180	1
21	9/06/77	4	<10	<50	<20	<50	2	<50	50	890	15,000	530	160,000	4.1	[illegible]	190	13,300	1.2
22	9/06/77	2	10	50	20	50	ND	<50	50	660	8,800	380	240,000	5.6	5	54	[illegible]	[illegible]
23	9/06/77	2	<10	<50	<20	<50	2	<50	50	610	8,500	360	140,000	1.5	8	590	8,080	[illegible]
24	9/07/77	1	<10	<50	20	50	ND	50	40	100	2,800	290	33,000	1.0	10	110	1,850	
25	9/07/77	1	<10	50	20	<50	2	50	40	80	3,300	390	150,000	3.0	2	88	[illegible]	2
26	9/07/77	1	<10	<50	20	50	ND	50	50	140	[illegible]	240	140,000	[illegible]	6	130	[illegible]	[illegible]
27	9/07/77	1	<10	<50	20	50	2	50	[illegible]	150	3,200	200	43,000	2.5	4	130	2,290	[illegible]
28	9/07/77	3	<10	50	20	50	2	50		[illegible]	6,900	360	58,000	5.8	1.9	140	23,000	[illegible]
29	9/07/77	4	<10	<50	20	50	2	50	50	[illegible]	5,000	840	160,000	2.4	2.3	150	[illegible]	[illegible]
30	9/08/77	3	<10	50	20	50	2	<50	50	[illegible]	11,000	940	170,000	6.4	[illegible]	130	[illegible]	[illegible]
31	9/08/77	1	<10	<50	<20	<50	[illegible]	<50	30	270	4,500	210	22,000	10.0	1	110	[illegible]	4
32	9/08/77	4	<10	<50	<20	<50	2	50	60	910	13,500	440	290,000	[illegible]	2.3	150	42,900	[illegible]
33	9/08/77	2	<10	50	<20	50	2	50	20	430	6,800	230	50,000	[illegible]	6	[illegible]	[illegible]	3
34	9/08/77	3	10	50	20	<50	[illegible]	<50	80	620	9,300	420	140,000	5.2	9	[illegible]	[illegible]	[illegible]
35	9/09/77	[illegible]	10	[illegible]	20	<50	2	<50	40	1,000	8,800	250	190,000	5.3	6	24	19,500	
36	9/09/77	3	<10	50	<20	<50	<2	50	30	350	11,000	400	240	4.8	4	100	25,200	9
37	9/12/77	3	<10	<50	<20	<50	2	50	60	450	7,500	510	180	2.7	3	74	6,740	[illegible]
38	9/12/77	3	<10	<50	20	<50	2	50	50	500	7,400	480	260,000	12.0	4	54	[illegible]	[illegible]
39	9/12/77	1	<10	<50	20	<50	<2	50	10	130	2,000	110	66,000	2.7	3	100	2,940	[illegible]
40	9/12/77	1	<10	<50	60	<50	2	<50	40	180	4,300	150	87,000	9.5	8	100	[illegible]	[illegible]
41	9/12/77	10	<10	<50	<20	<50	4	50	80	1,500	28,000	560	250,000	[illegible]	[illegible]	260	[illegible]	[illegible]
42	9/13/77	2	10	50	<20	<50	2	50	30	220	[illegible]	220	99,000	[illegible]	4	32	[illegible]	6.0
43	9/13/77	1	<10	<50	<20	<50	<2	<50	20	130	2,800	120	85,000	9.9	1	65	[illegible]	[illegible]
44	[illegible]	[illegible]	<20	50	<20	<50	ND	<50	20	200	3,000	89	89,000	[illegible]	[illegible]	53	[illegible]	2
45	9/14/77	[illegible]	<10	50	<20	50	<2	<50	30	1,800	24,000	2,000	440,000	[illegible]	[illegible]	[illegible]	54,800	[illegible]
46	[illegible]	[illegible]	10	<50	<20	<50	1.0	<50	10	79	1,700	40	[illegible]	1.8	4	[illegible]	[illegible]	1

Table 8.--Continued

Station number	Date	BHC	Lindane	Heptachlor	Aldrin	Endosulfan	DDE	Dieldrin	Endrin	DDD	DDT	Mirex	Methoxychlor	DDVP	Phosdrin
		Micrograms per kilogram													
1	8/29/77	ND	1.50	ND	ND	ND	0.15	0.00[b]	0.00[b]	[illegible]	[illegible]	ND	ND	ND	ND
2	8/29/77	ND	0.25	ND	ND	ND	ND	0.67	[illegible]	[illegible]	[illegible]	ND	ND	ND	ND
3	8/29/77	ND	0.33	0.15	ND	ND	ND	ND	ND	ND	[illegible]	ND	ND	ND	ND
4	8/29/77	ND	0.50	0.73	ND	ND	ND	ND	0.61	2.58	1.64	ND	ND	ND	ND
5	8/20/77	ND	0.35	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
6	8/30/77	ND	1.63	ND	ND	ND	0.30	0.00[b]	0.00[b]	[illegible]	[illegible]	ND	ND	ND	ND
7	8/30/77	ND	0.29	0.98	5.21	ND	ND	1.03	ND	ND	6.59	ND	ND	ND	ND
8	8/30/77	ND	0.19	ND	14.14	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
9	8/30/77	ND	1.16	1.72	45.50	ND	ND	2.46	0.61	[illegible]	ND	ND	ND	ND	ND
10	[illegible]	ND	0.60	[illegible]	138.71	ND	ND	[illegible]	ND	[illegible]	[illegible]	ND	ND	ND	ND
11	8/31/77	ND	1.34	0.70	34.31	ND	ND	0.87	2.75	ND	ND	ND	ND	ND	ND
12	8/31/77	ND	0.29	0.84	12.35	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
13	8/31/77	ND	2.44	ND	ND	ND	6.08	0.57	0.46	4.83	3.08	ND	ND	ND	ND
14	9/01/77	ND	0.11	ND	94.03	ND	ND	ND	ND	2.83	ND	ND	ND	ND	ND
15	9/01/77	ND	0.18	ND	ND	ND	ND	ND	ND	0.87	ND	ND	ND	ND	ND
16	9/01/77	ND	2.04	ND	ND	ND	0.26	0.00[b]	0.26	[illegible]	0.00[b]	ND	ND	ND	ND
17	9/01/77	ND	0.76	ND	814.13	ND	ND	0.70	0.86	9.86	1.82	ND	ND	ND	ND
18	9/01/77	ND	1.18	ND	ND	ND	ND	ND	ND	0.50	ND	ND	ND	ND	ND
19	9/06/77	ND	0.22	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
20	9/06/77	ND	0.47	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
21	9/06/77	ND	0.12	ND	2.79	ND	ND	ND	0.93	ND	ND	ND	ND	ND	ND
22	9/06/77	ND	0.20	ND	2.80	ND	ND	ND	ND	1.29	ND	ND	ND	ND	ND
23	9/06/77	ND	0.19	0.43	85.60	ND	ND	ND	ND	1.79	0.78	ND	ND	ND	ND
24	9/07/77	ND	2.35	ND	ND	ND	0.00[b]	0.00[b]	0.00[b]	0.00[b]	0.22	ND	ND	ND	ND
25	9/07/77	ND	0.26	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
26	9/07/77	ND	0.20	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
27	9/07/77	ND	0.20	ND	0.30	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
28	9/07/77	ND	0.16	ND	ND	ND	ND	0.50	1.95	4.13	0.69	ND	ND	ND	ND
29	9/07/77	ND	0.20	ND	44.75	ND	ND	ND	0.46	1.07	ND	ND	ND	ND	ND
30	9/08/77	ND	0.26	ND	121.64	ND	ND	ND	ND	1.14	ND	ND	ND	ND	ND
31	9/08/77	ND	1.12	ND	ND	ND	0.66	0.00[b]	0.00[b]	0.85	0.34	ND	ND	ND	ND
32	9/08/77	ND	0.53	ND	ND	ND	ND	0.35	ND	4.62	1.66	ND	ND	ND	ND
33	9/08/77	ND	0.20	ND	3.82	ND	ND	ND	1.27	ND	ND	ND	ND	ND	ND
34	9/08/77	ND	0.27	ND	99.87	ND	ND	ND	1.18	1.52	ND	ND	ND	ND	ND
35	9/09/77	ND	2.42	ND	ND	ND	0.15	0.00[b]	0.48	0.00[b]	0.00[b]	ND	ND	ND	ND
36	9/09/77	ND	0.16	ND	ND	ND	ND	ND	1.44	ND	1.00	ND	ND	ND	ND
37	9/12/77	ND	0.29	ND	31.08	ND	ND	ND	ND	0.67	ND	ND	ND	ND	ND
38	9/12/77	ND	0.13	ND	56.80	ND	ND	ND	ND	ND	2.82	ND	ND	ND	ND
39	9/12/77	ND	ND	ND	81.21	ND	ND	ND	0.57	ND	ND	ND	ND	ND	ND
40	9/12/77	ND	ND	ND	0.25	ND	ND	ND	ND	ND	0.85	ND	ND	ND	ND
41	9/12/77	ND	0.75	ND	ND	ND	ND	0.51	0.36	2.58	ND	ND	ND	ND	ND
42	9/13/77	ND	0.70	ND	15.00	ND	ND	0.19	ND	ND	[illegible]	ND	ND	ND	ND
43	9/13/77	ND	4.06	ND	ND	ND	ND	0.15	0.00[b]	0.00[b]	0.00[b]	0.00[b]	ND	ND	ND
44	11/17/77[a]	ND	ND	ND	1.20	ND	ND	ND	0.37	ND	ND	ND	ND	ND	ND
45	[illegible]	ND	0.57	ND	ND	ND	ND	ND	0.95	ND	ND	ND	ND	ND	ND
46	11/17/77[a]	ND	ND	ND	0.45	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND

Table 8.--Continued

Station number	Date	Phorate	Diazinon	Disulfoton	Methyl Parathion	DEF	Ethion	Chlordane	Toxaphene	[illegible]	Ronnel	PCB (AR 1242)	PCB (AR 1254)	PCB (AR 1260)
		Micrograms per kilogram												
1	8/29/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.00[b]	ND
2	8/29/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
3	8/29/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	2.42	ND	ND
4	8/29/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
5	8/29/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
6	8/30/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.00[b]	ND
7	8/30/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
8	8/30/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	5.63
9	8/30/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	31.25
10	8/31/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	14.26
11	8/31/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
12	8/31/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	2.42
13	8/31/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	82.19	ND
14	9/01/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	7.17
15	9/01/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.53
16	9/01/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.00[b]	ND
17	9/01/77	ND	ND	ND	ND	ND	ND	2.64	ND	ND	ND	ND	ND	32.38
18	9/01/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	3.36	ND	ND
19	9/06/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.70	ND	ND
20	9/06/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
21	9/06/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
22	9/06/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.94
23	9/06/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	2.23
24	9/07/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.00[b]	ND
25	9/07/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	[illegible]
26	9/07/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	[illegible]
27	[illegible]	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	[illegible]
28	[illegible]	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	[illegible]
29	9/07/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	[illegible]
30	9/08/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	[illegible]
31	9/08/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	.92	ND
32	9/08/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	12.24
33	9/08/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.83
34	9/08/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	5.59
35	9/09/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.00[b]	ND
36	9/09/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	2.10
37	9/12/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.13
38	9/12/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
39	9/12/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	[illegible]
40	9/12/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
41	9/12/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	13.90
42	9/13/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.13
43	9/13/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	0.00[b]	ND
44	11/17/77[a]	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND
45	9/14/77	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	1.37
46	11/17/77[a]	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND	ND

a. Due to [illegible] 2 samples [illegible]
b. Detectable [illegible] reportable [illegible]
ND Not detected.

Table 9.--Total carotenoid pigment concentration (µg/l) on the Alabama-Coosa Rivers from August 9 through December 8, 1977 (Carotenes and xanthophylls)

Station number	Collection period					
	8/9-8/25	8/29-9/14	9/19-10/4	10/11-10/25	10/31-11/17	11/21-12/8
1	5.5	6.2	7.0	1.4	9.4	6.7
2	4.1	5.3	6.1	16.0	16.0	12.0
3	10.0	6.2	4.9	11.0	24.0	19.0
4	5.2	5.1	7.0	5.4	7.9	23.0
5	6.2	6.3	5.4	3.3	13.0	44.0
6	[illegible]	[illegible]	[illegible]	9.4	16.0	8.7
7	2.0	5.6	5.0	30.0	10.0	8.7
8	[illegible]	[illegible]	10.0	6.2	24.0	5.5
9	[illegible]	4.6	7.0	11.0	17.0	12.0
10	5.0	5.7	5.0	11.0	9.8	12.0
11	20.0	7.4	5.1	5.1	16.0	15.0
12	4.8	3.6	5.0	5.3	14.0	11.0
13	8.4	4.8	7.4	9.5	12.0	10.0
14	[illegible]	13.0	6.1	28.0	20.0	9.4
15	19.0	7.4	4.4	27.0	5.7	9.8
16	40.0	6.1	5.4	3.3	11.0	9.5
17	10.0	9.8	5.0	7.0	26.0	4.9
18	[illegible]	6.3	5.0	14.0	15.0	4.5
19	[illegible]	5.1	7.4	2.4	13.0	3.7
20	5.6	9.4	5.4	8.6	7.0	4.8
21	3.7	5.6	6.9	7.4	10.0	4.9
22	2.6	7.4	5.0	7.2	7.4	6.6
23	6.9	14.0	8.2	13.0	5.4	7.8
24	5.4	8.5	6.6	1.5	1.4	9.5
25	9.4	7.9	6.7	6.5	6.9	3.6
26	12.0	7.1	7.9	7.2	3.3	3.1
27	6.9	7.5	9.2	6.9	6.1	22.0
28	4.0	7.0	7.5	4.2	9.4	9.2
29	7.1	12.0	7.1	9.7	8.7	8.2
30	5.6	12.0	9.6	9.0	9.9	11.0

Table 9.--Continued

Station number	Collection period 8/9-8/25	8/29-9/14	9/19-10/4	10/11-10/25	10/31-11/17	11/21-12/8
31	5.0	6.3	15.0	18.0	1.7	16.0
32	9.2	13.0	18.0	19.0	9.7	19.0
33	7.2	12.0	10.0	9.2	3.8	8.2
34	12.0	14.0	9.7	9.2	6.6	12.0
35	5.8	11.0	7.9	4.6	10.0	7.5
36	6.7	16.0	14.0	8.6	6.7	23.0
37	9.1	3.9	6.4	8.2	8.7	8.2
38	5.5	12.0	9.0	3.1	5.9	6.2
39	7.4	14.0	11.0	3.3	6.6	11.0
40	3.9	7.2	7.4	8.6	4.8	7.0
41	9.8	8.7	7.7	11.0	5.8	8.1
42	10.0	6.3	7.8	2.[illegible]	5.5	9.3
43	5.4	11.0	5.4	10.0	6.2	9.5
44	10.0	---	13.0	2.6	6.8	5.8
45	3.2	8.4	13.0	16.0	8.8	5.7
46	5.7	--	8.9	6.[illegible]	9.7	6.9

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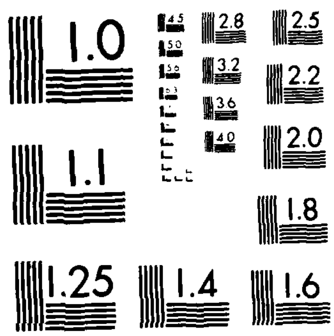

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Table 10.--Maximum dry weight yields (mg/l) of *Selenastrum capricornutum* (Greeson, 1977) at 46 Alabama-Coosa River stations from August 29 through September 14, 1977

Station number	Date of collection	Algal biomass
1	8/29/77	1.85
2	8/29/77	1.00
3	8/29/77	0.20
4	8/29/77	0.50
5	8/29/77	1.15
6	8/30/77	1.02
7	8/30/77	0.80
8	8/30/77	1.24
9	8/30/77	1.76
10	8/31/77	1.01
11	8/31/77	0.68
12	8/31/77	1.30
13	8/31/77	1.85
14	9/01/77	2.36
15	9/01/77	4.47
16	9/01/77	5.31
17	9/01/77	5.70
18	9/01/77	2.98
19	9/06/77	1.05
20	9/06/77	1.04
21	9/06/77	1.07
22	9/06/77	2.40
23	9/06/77	4.64
24	9/07/77	6.20
25	9/07/77	9.49
26	9/07/77	9.58
27	9/07/77	8.25
28	9/07/77	10.74
29	9/07/77	12.80
30	9/08/77	8.76
31	9/08/77	0.68
32	9/08/77	0.66
33	9/08/77	0.55
34	9/08/77	0.62
35	9/09/77	0.77

Table 10.--Continued

Station number	Date of collection	Algal biomass
36	9/09/77	0.98
37	9/12/77	3.39
38	9/12/77	2.24
39	9/12/77	0.[illegible]1
40	9/12/77	0.54
41	9/12/77	0.68
42	9/13/77	1.07
43	9/13/77	3.47
44	9/14/77	*
45	9/14/77	3.45
46	9/14/77	*

*No sample collected because of repairs on Claiborne Lock and Dam.

B. Biological

1. Plankton

Plankton samples collected from the Alabama River were found to include 54 taxa (principally genera) of zooplankton and 65 taxa (principally genera) of phytoplankton. Plankton identification and enumeration (number of organisms per liter of river water) are tabulated in tables B-1 through B-8. Selected STORET data for planktonic studies are located in table A-4.

Zooplankters most commonly encountered in all samples were crustaceans (table B-1), rotifers (table B-2), and protozoans (table B-3). Minor contributors (table B-4) included insects, nematodes and pelecypods. The class Rotifera contained the greatest number of zooplankton taxa (25).

The phytoplankton community was found to be composed principally of green algae (table B-5), diatoms (table B-6) and blue-green algae (table B-7). Diatoms were only enumerated during the sampling period of October 31 through November 17, 1977. Minor phytoplankton contributors found periodically during the study are included in table B-8. The division Chlorophyta, represented by 29 genera, contained the greatest diversity of all plankton groups analyzed.

2. Benthic Macroinvertebrates--Ponar

Ponar samples were found to contain a cumulative total of 134 taxa of benthic macroinvertebrates (tables C-1 through C-4). Most of the organisms for the first two sampling periods were identified to the generic level; however, owing to time and manpower constraints, identification of the specimens contained for the third sampling period was taken only to the family level. A few taxa (Bryozoa, Turbellaria, Nematoda, Araneae, Acarina and Nematomorpha) could be identified only to the phylum, class, or order level due to the lack of published keys. Identified genera contained in each order (tables C-1 through C-4) are listed first, followed by unidentified genera which are listed by family.

The insects were the most diverse and frequently encountered benthic group in the samples, as indicated by the 77 taxa identified and enumerated in table C-1. Chironomidae of the class Insecta was the dominant family of benthic animals collected throughout the entire study. Other phyla represented by large numbers included the Annelida (table C-2) and the Mollusca (table C-3). Table C-4 lists 23 miscellaneous taxa that were collected periodically during the study. Data on several taxa enumerated in the above tables were placed on the EPA STORET retrieval system (table A-4).

A Shannon-Weaver diversity index was calculated for each station, and the results are tabulated in table C-5. Benthic biomass data for each station are located in table C-6.

3. Benthic Macroinvertebrates--multiplate sampler

Of the 68 samplers deployed in the Alabama River, only 35 were retrieved. The other 33 samplers were lost to vandalism. The multiplate samplers recovered contained representatives of 14 taxa (table C-7).

4. Aquatic Macrophytes

The macrophytes of the Alabama River were studied at 276 sites (attachment 1 and table D-1) between the confluence of the Coosa and Tallapoosa Rivers and Claiborne Lock and Dam. A total of 76 plant species comprising 43 families were encountered. The species and stations at which they were found are compiled into an annotated list of species (table D-2), which is arranged phylogenetically by family. Noxious species present in large numbers, which could infringe on the recreational and/or navigational uses of the river, are also noted.

V. DISCUSSION

A. Chemical

When compared to water-quality criteria established by the U.S. Environmental Protection Agency (1976), the results of the analyses in this study indicated that the water quality of the Alabama River is generally good. Parameters that periodically exceeded the recommended limits and therefore deserve additional discussion included ammonia as nitrogen, manganese, dissolved iron, total iron, fecal coliform, and pH. The other 33 parameters were all within acceptable limits and, with the exception of BOD_5, DO, COD, temperature, TKN, total P, ortho P, NO_2 + NO_3, fecal streptococci, total coliform, hardness, color, TOC, sulphate, chloride, and specific conductance, are not discussed any further.

1. Water-quality Parameters

Vertical profiles for DO, temperature, conductivity, and pH suggest that no significant stratification of water occurred during the study period (figs. A-1 through A-13). Allowing for slight differences in water-quality parameters at the surface and 5 feet below the surface, values for all tested parameters appeared within a 5-percent deviation of the mean throughout the water column. Slightly elevated DO values and water temperatures in the upper foot of the water column may be attributed to the influence of air temperature and surface aeration. The BOD_5 test is a valuable tool for estimating the bio-oxidizable fraction of surface waters or waste-waters discharged to them. The low BOD_5 values obtained for all three reservoirs speak highly of relatively clean surface waters in the study area. The COD determination is a measure of the oxidizable material in the water. It also represents an approximation of the minimum amount of organic and reducing material present. The three reservoirs showed very low levels of COD indicating the relatively good state of the surface water as far as organic or sewage treatment breakdown throughout the reservoirs is concerned.

The pH values measured during the study were within the acceptable criteria range at all but one station. The acidic pH at station 19 possibly could be a result of the reworking of eroded river banks and upgrading of the U.S. Army Corps of Engineers' recreation area at Steele's Landing. Newly sodded grass in the area showed signs of a recent application of fertilizer at the time of sampling, and this possibly could be the reason for the low pH

value. Another possible cause of this low pH could be the effect of decaying leaves in the river; but if this were the cause, more than one station in this area should have exhibited a low pH.

The highest values for specific conductance occurred simultaneously with the lowest values for pH. The time of collection of these samples was October 17, 1977. Occurrence of such values in the fall supports the theory that leaf decay influences pH and conductivity. The color (apparent) value was also recorded at its highest level (140 Pt-Co units) during this time, which could also be attributed to an increased organic load. Total organic carbon concentrations, although not given a specific water-quality criteria limit, may be used to indicate possible organic contamination within a reservoir or other water system.

Levels of TOC in the rivers of the study area are generally within the same range as those determined by a 10-year USGS-NASQAN (National Stream Quality Assessment Network) study. The stations, corresponding values, and dates of collection exceeding the 10-year USGS-NASQAN Study average of 10 mg/1 TOC were sites 3 (15 mg/1 on November 21, 1977), 6 (36 mg/1 on November 22, 1977), 12 (14 mg/1 on August 31, 1977), and 13 (19 mg/1 on November 28, 1977). This data is significant in that the NASQAN sites are near station 8 in the Jones Bluff Reservoir and station 45 in the Claiborne Reservoir; stations in these two areas did not have high TOC during this study period or the USGS 10-year effort. The USGS could relocate their stations upstream or downstream in the high organic carbon areas.

Sulfate and chloride were fairly low in all three reservoirs as compared to other major rivers in Alabama. Neither parameter exceeded one-tenth of the 250 mg/1 criteria limit as set by EPA.

The nutrient concentrations, which include nitrate + nitrite, ammonia, TKN, total phosphorus and orthophosphorus, were all within criteria limits except those of the ammonia species. Ammonia concentrations fluctuated widely with different sampling times and sites along the 252.5 river miles studied. Violations of fish and wildlife criteria for ammonia as N occurred at stations 14 through 18, 20 through 22, 25 through 29, 33 through 36, and 39 through 46 during run 1; stations 1 through 39 and 41 through 45 during run 2; stations 1 through 3, 5, 7 through 14, 16, 19, 22, 24, 26, and 30 through 46 during run 3; stations 1 through 3, 5 through 14, 16 through 19, 21, 23, 24, 27, 30, 31, 34, 35, 39, and 41 during run 4; stations 3 through 6, 11, 17, 23, 24 through 27, 31, 33, 35 through 37, 40, 41, and 43 during run 5; and stations 5, 7, 10, 21, 26, 28, 30, 34, 36, 42, and 43 during run 6. Production of ammonia generally results from the decomposition of nitrogenous organic matter. Concentrations in excess of the EPA standard (0.2 mg/1) in surface water usually indicate organic pollution. These high

levels usually suggest specific pollution from sewage or industrial contaminants. The Alabama Water Improvement Commission's (AWIC) revised list of permitted waste dischargers shows 5 municipal dischargers, 11 industrial dischargers, 23 semi-private and private dischargers, and 9 mining dischargers to the Alabama River or its tributaries in the study area (table A-3). Two waste discharge points, a sand and gravel operation and a hog farm, were identified between river miles 270 and 260. Ammonia concentrations along this segment and as far south as river mile 240 were elevated at the time of sampling.

Dissolved manganese values exceeded the EPA water-quality criteria at nine sampling stations (10, 12, 15, 22, 23, 24, 26, 28 and 41) throughout the study period. Elevated manganese concentrations may affect the taste of drinking water, stain plumbing fixtures and laundry, and foster the growth of microorganisms in reservoirs and other water systems. Until more complete data on acute and sublethal effects of manganese on aquatic organisms are available, the U.S. Environmental Protection Agency (1976) advises that dissolved manganese concentrations greater than 100 µg/l may constitute a health hazard.

During the study, concentrations of dissolved and total iron at eight stations exceeded the permissible water-quality criteria (.30 mg/l) during five of the six sampling intervals. Because of its widespread use by man for his many industrial activities, iron is a common contaminant in the aquatic environment.

The waters of the Alabama and Coosa Rivers would have to be classified as soft (0-60 mg/l as $CaCO_3$) to moderately hard (61-120 mg/l) based on the data collected over the six sampling runs (table A-1). Hardness (which reflects calcium and magnesium cations) in conjunction with other chemical properties, such as acidity and other polyvalent cations, is an indication of the soap-consuming power of the water. Hard water is not generally believed to have harmful effects on man, although the relation to urinary concretions is controversial. Hard water decreases the sensitivity of fish to toxic metals (McKee and Wolf, 1963). Total manganese values, which were significantly elevated over the dissolved manganese values, as was expected, showed highest concentrations from stations 40 and 41 during run 1 and from stations 1 through 14 during runs 2 through 6. The highest levels occurred in the Jones Bluff Reservoir, which is underlain by geologic materials primarily from the Piedmont.

Fecal coliform bacteria exceeded the water-quality criteria (2000 CT/100 ml) twice during the study at stations 6 (2600 CT/100 ml) and 7 (2900 CT/100 ml). Station 6 is immediately above the city of Montgomery, whereas station 7 is adjacent to the downtown area. The high densities of these organisms, therefore, are indicative of relatively recent organic pollution from the Montgomery

area. The specific area in which this high fecal coliform occurred leads one to suspect raw sewage contamination of the river by either animal or human wastes. Total coliform bacteria, which is a composite of all coliform groups, showed highest levels during the warmest sampling months, which occurred during run 1 (August 9-25, 1977). Significant changes occurred in total coliform counts, which diminished as the cooler fall and winter months approached. This is typical of this bacteria group because maximum growth levels occur at 35°C (98.6°F). Total coliform counts for the Jones Bluff Reservoir exceeded those for all three reservoirs in the study area; Claiborne Reservoir had the lowest levels for all six sampling runs. Fecal streptococcal bacteria, which are similar to the fecal coliform group, exhibited their highest levels in the Jones Bluff Reservoir during the warm August sampling run. All fecal streptococci levels were below the Alabama criteria of 2000 CT/100 ml.

2. Sediment Parameters

The mechanical analyses of the sediment samples indicated slight differences in the bottom material of the river at stations 7, 17, 19, 31, 36, 42, and 46 (table 7). The differences in the texture of the sediment samples from stations 7 and 31 (medium sand) and 17 and 19 (silty sand) could possibly be attributed to the differences in areal geology and soil weathering, stream deposition, and/or other reasons.

The high concentrations of total magnesium, total iron, and total manganese all occurred within the same segment of the Alabama River at stations 9 and 10 (table 8). These stations lie below Catoma Creek near Montgomery, Alabama, and the surrounding land is used predominantly for agriculture. The river at these stations also receives drainage from a local U.S. Air Force Base and the Catoma Creek sewage treatment plant.

The levels of pesticide residue for selected sediment samples showed high concentrations of Aldrin, PCB's (Aroclor 1260 and Aroclor 1254), and DDT (table 8). Compared to U.S. Department of Agriculture (USDA) data for the southeastern United States (Edwards, 1970), these residues appeared very high at stations 9, 10, 13, 17, 30, 32, 34, 38, 39 and 41. The DDT concentration of the sediment of the Alabama-Coosa Rivers averaged 620 nannograms per kilogram (ng/kg) with a maximum value of 6590 ng/kg at station 7. Aldrin concentrations reported by Edwards (1970) for soils in the southeastern United States showed a maximum value of 18,000 ng/kg and a mean of 20,000 ng/kg. Aldrin averaged 37,110 ng/kg in the Alabama-Coosa River sediments and reached a maximum of 814,130 ng/kg at station 17 (located at the pool side of Jones Bluff Lock

and Dam). Some pesticides (i.e., DDT including DDD and DDE, Aldrin, Dieldrin, and PCB's) are considered especially hazardous because of their persistence and accumulation in aquatic organisms. With further in-depth studies, the possible origin of these residues may be determined. These compounds, including some of their metabolites, are directly toxic to various aquatic species at concentrations of less than 1 μg/l. Their accumulation in aquatic systems presents a hazard, both real and potential, to animals in the higher trophic levels, including man. Present knowledge is not sufficient to predict or estimate safe concentrations of these compounds in aquatic systems. However, residue concentrations in aquatic organisms and sediment provide a measure of environmental contamination.

Total cadmium, chromium, lead, and nickel concentrations in the sediment samples were specifically analyzed for by standard methods but were found to be present just below their reporting limits (American Public Health Association, 1975). Total arsenic, mercury, copper, and zinc were present in low levels also as compared to values obtained for the two USGS-NASQAN stations on the Alabama River (USGS, 1978). These two NASQAN stations are located at the U.S. Highway 82 bridge near Montgomery and U.S. Highway 84 bridge at Claiborne, Alabama.

3. Other Parameters

Chlorophylls *a*, *b* and *c* were consistently higher at stations 13 through 24 as compared to any other segment of the river during this study. Chlorophylls *b* and *c* were highest during the warmest month (August) of the study, probably as a result of increased plant growth. However, chlorophyll *a* was highest during the third sampling run (September 19 through October 4, 1977) when the water's temperature had dropped an average of 9 degrees below that of sampling run 1 (August 9-25, 1977). Because the chlorophyll parameters were not sampled throughout the four seasons of the year, no further conclusions can be drawn until more extensive data are available.

Results of the algal growth potential experiments indicate areas of high nutrient concentrations and subsequent increased plant growth on the river. This is true especially in the stream segment near stations 28 and 29 where the dry weight of algae exceeded 10 mg/l. High ammonia values also occurred in this area. Under elevated pH conditions, this situation could cause increases in nitrogen components, such as nitrate, nitrite or organic nitrogen, which in turn would provide necessary nitrogen along with available phosphorus to stimulate an increase in plant growth.

B. Biological

1. Plankton

Both the phytoplankton and the zooplankton were investigated during the study. The phytoplankters, collectively known as "producers," form the base of the aquatic food chain because they have the ability to synthesize energy-containing organic compounds through a process which incorporates solar radiation and inorganic nutrients. The zooplankters, collectively called "consumers," lack this synthesizing capability and, for this reason, must feed upon the phytoplankton to satisfy their nutritional requirements. In nature, therefore, zooplankton diversity is dependent upon phytoplankton diversity, which is ultimately dependent upon a variety of water-quality and environmental conditions. Conversely, any drastic environmental change that may degrade water quality or increase nutrient availability may also affect phytoplankton and zooplankton diversity.

Two of the most numerous phytoplanktonic groups (green algae and diatoms) and two of the most numerous zooplanktonic groups (cladocerans and rotifers) encountered during the study were arbitrarily selected to illustrate fluctuations in population densities (organisms/liter). Green algae from the first and second sampling periods and the green algae and diatoms from the third sampling period were plotted by river miles and station numbers in figures 47 through 49, respectively. Densities of cladocerans and rotifers collected during each of the three runs were plotted in figures 50 through 52.

Very little can be concluded about the data presented in figures 47 through 52 because of the relatively short time span during which the samples were collected. It is not unreasonable, however, to assume that the population decreases between the second and third sampling periods for both the phytoplankton and zooplankton are probably associated with seasonal climatic change. One interesting finding was the relatively high numbers of rotifers found at Station 41 during all three sampling periods compared to their density along the remainder of the river. The reasons for these consistently high values are unknown at this time; however, this area may warrant additional, in-depth investigations pending the results of the FY78 studies on the river.

Some problems concerning the collection and identification of plankton were encountered during this study, any of which could have biased the data; therefore, these should be mentioned. The first problem involved the use of the 80-micron mesh net that was required by the scope of work for plankton collection. While this mesh size was adequate for the collection of moderate to large

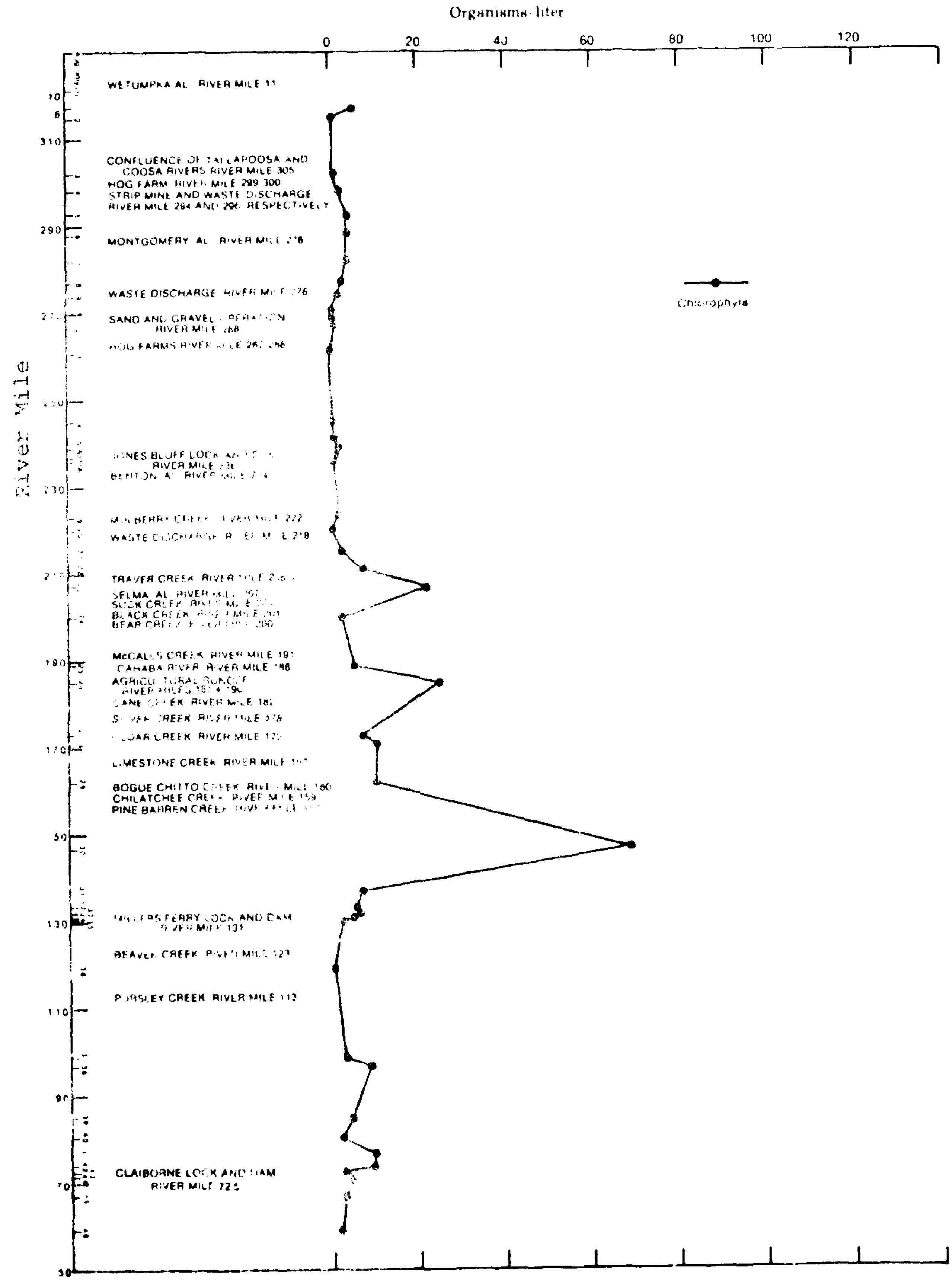


Figure 47.--Phytoplankton density at 46 Alabama-Coosa River system stations during the period August 9-25, 1977. Each dot represents one sample.

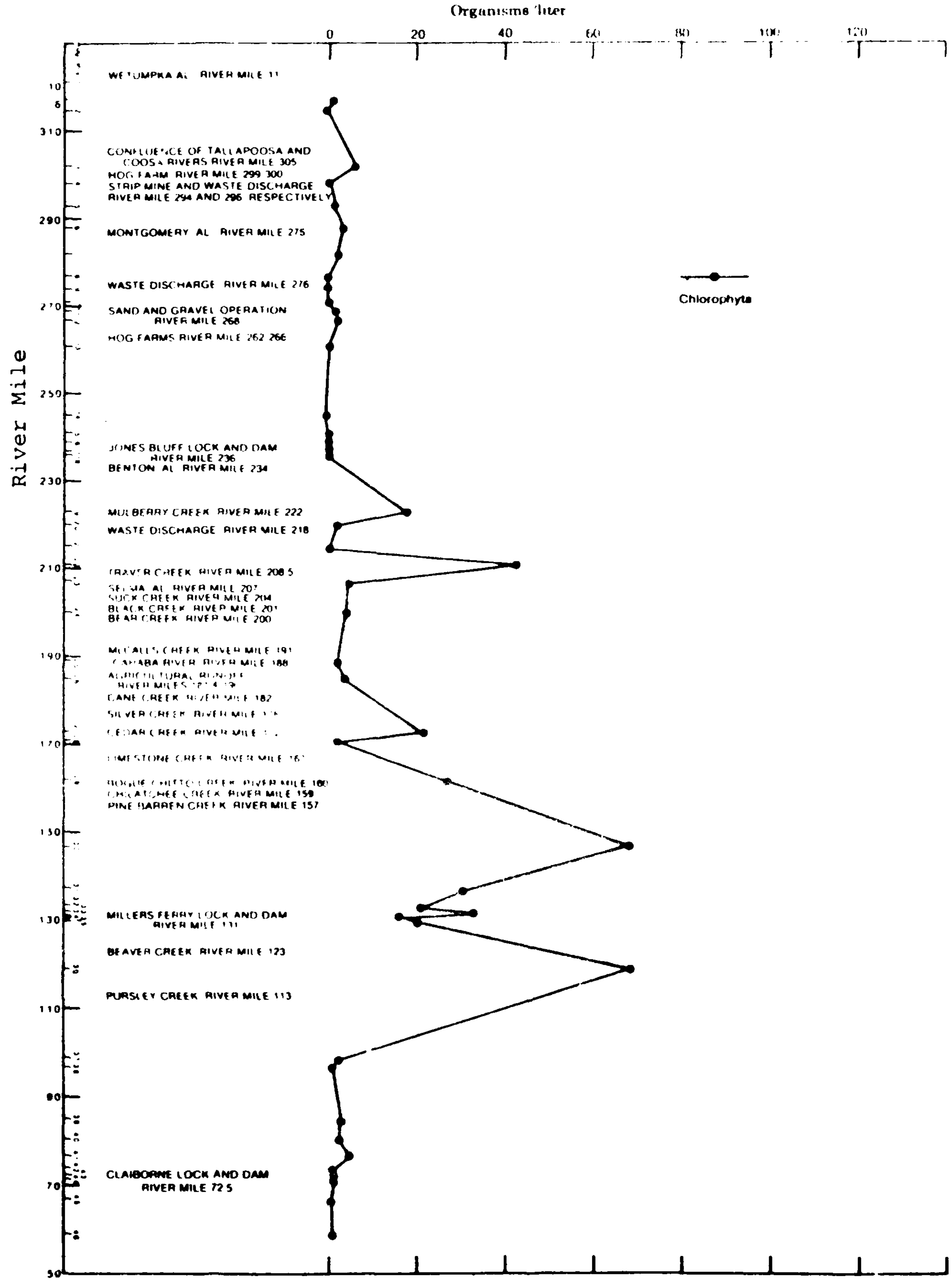


Figure 48.--Phytoplankton density at 46 Alabama-Coosa River system stations during the period September 19 through October 4, 1977. Each dot represents one sample.

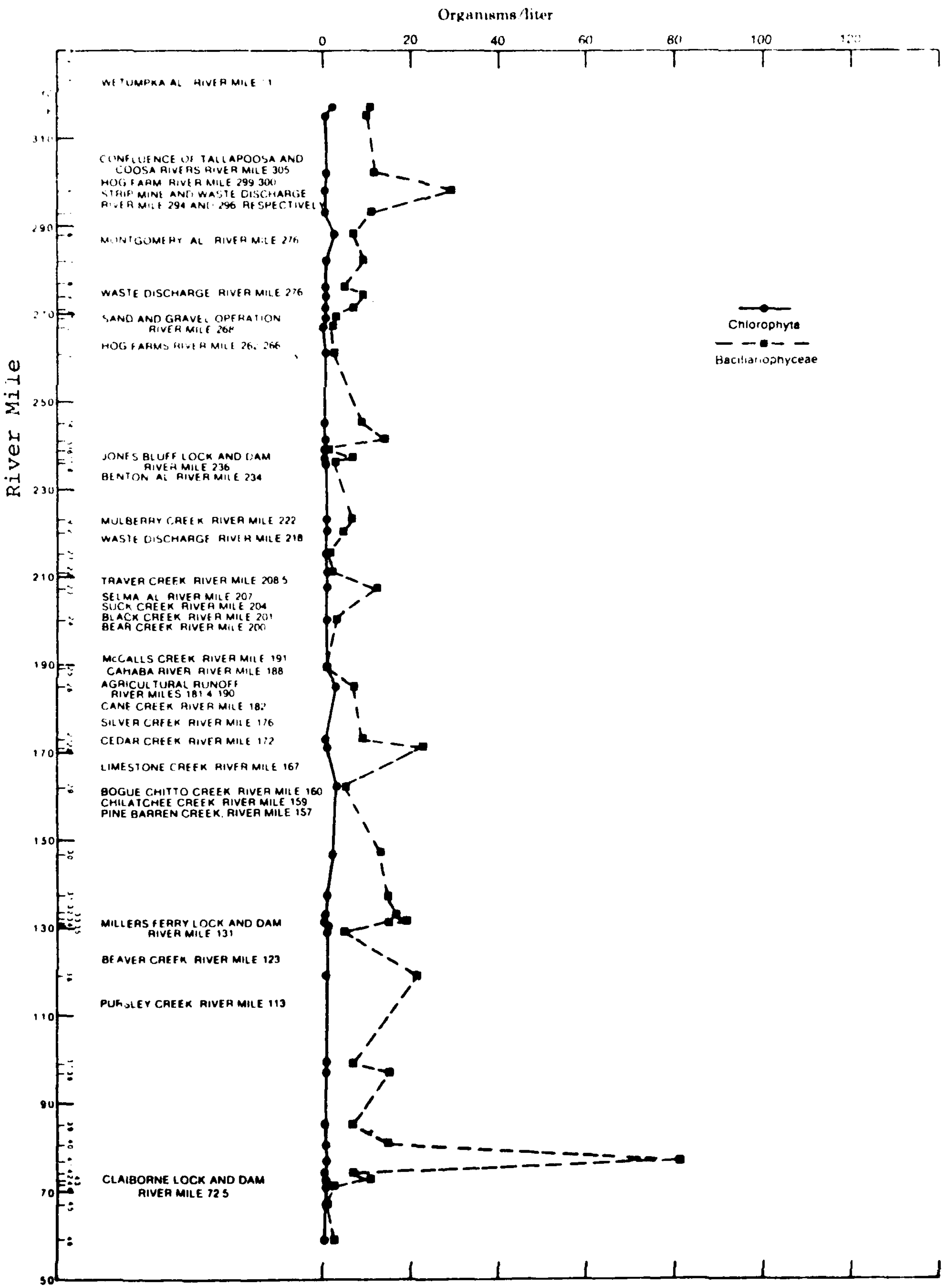
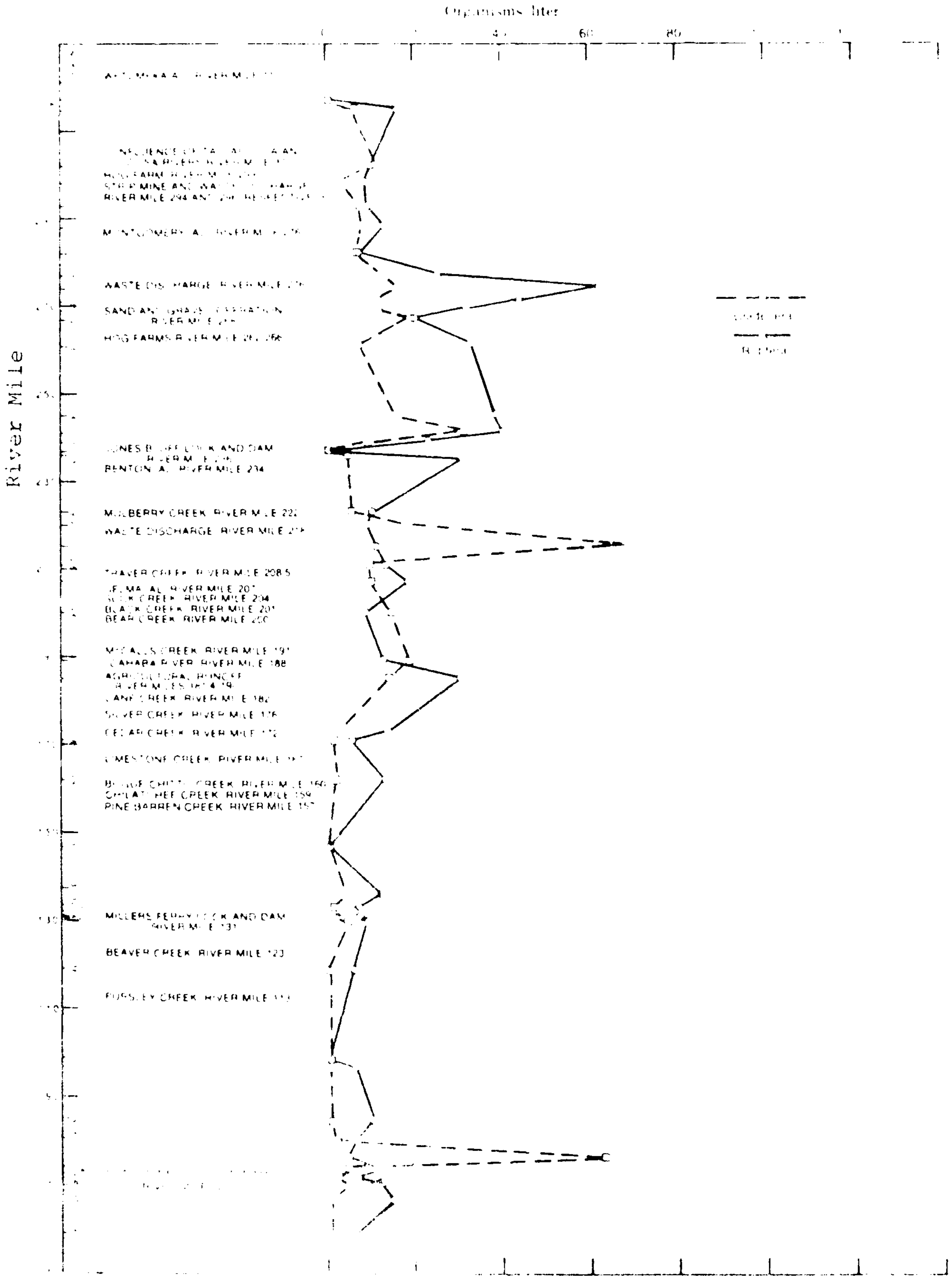


Figure 49.--Phytoplankton density at 46 Alabama-Coosa River system stations during the period October 31 through November 11, 1977. Each dot represents one sample.



Alabama-Coosa River system stations 25, 1977. Each dot represents one sample.

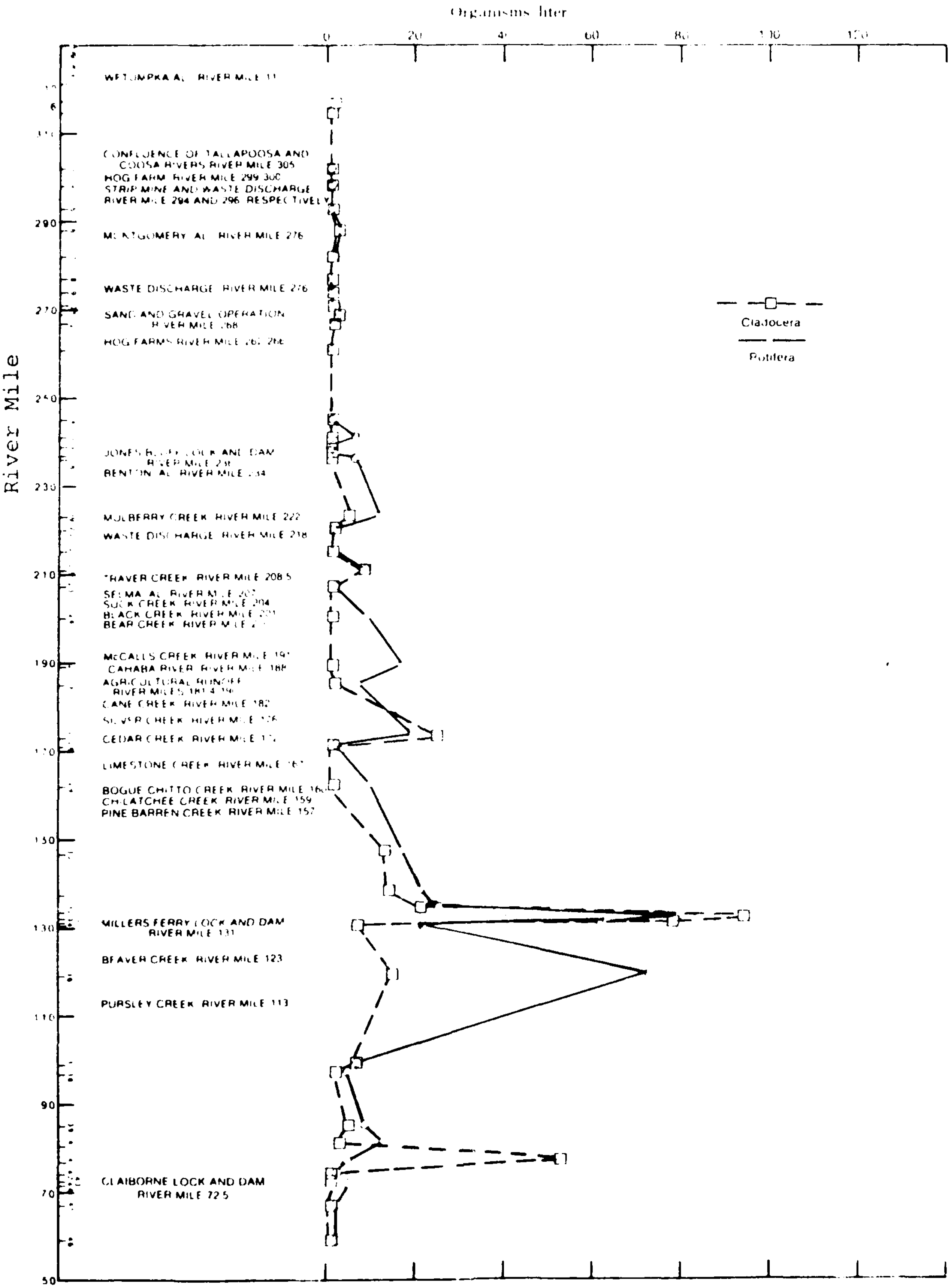
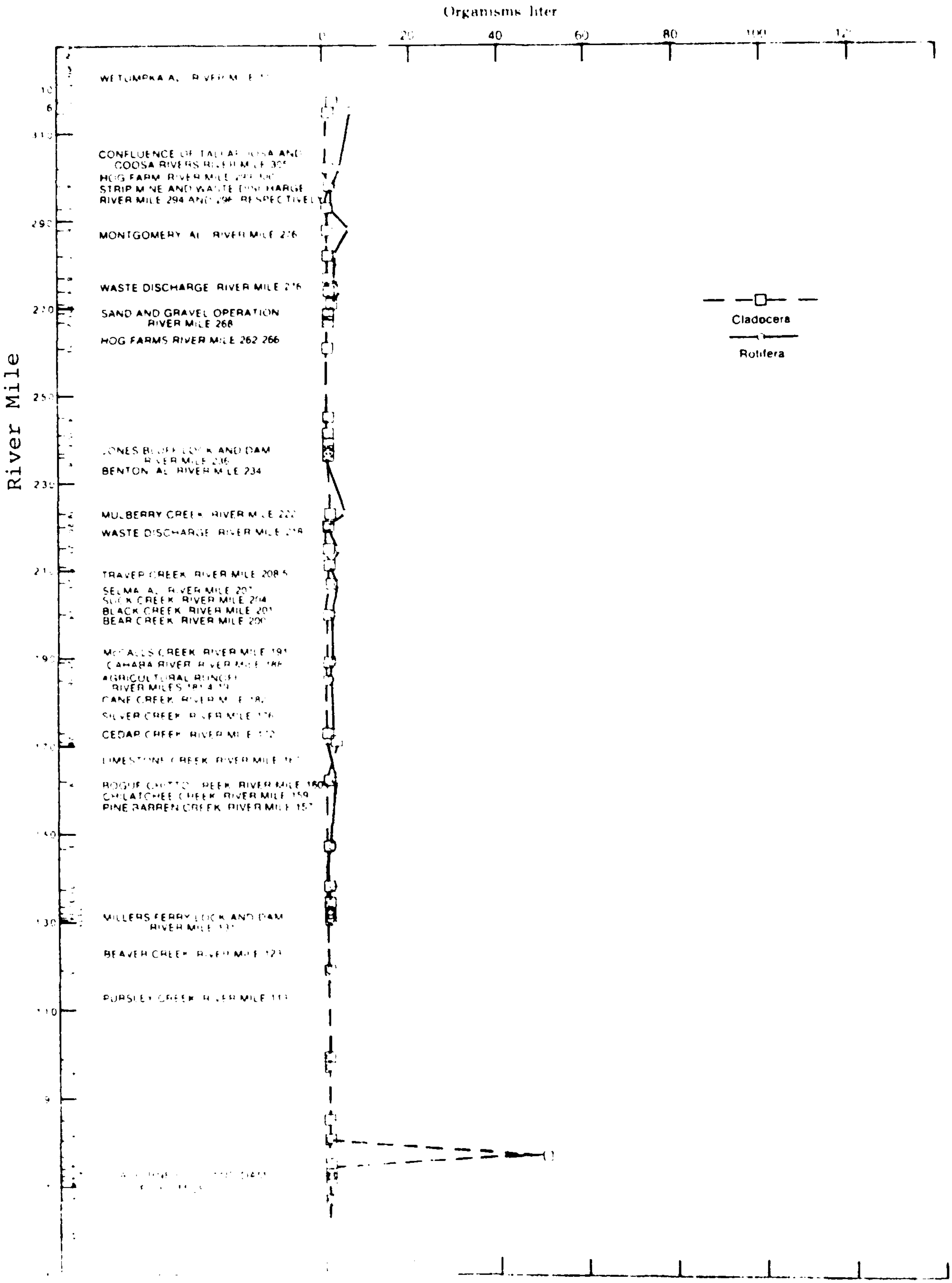


Figure 51.--Zooplankton density at 46 Alabama-Coosa River system stations during the period September 19 through October 4, 1977. Each dot represents one sample.



Alabama Coosa River system stations
31 through November 11, 1977. Each

planktonic organisms, most of the smaller protozoans and unicellular algae passed through the net and were not collected. The numbers of organisms reported for these two groups, therefore, may be conservative and should be considered as net plankton.

The unexpected abundance of fragmented colonial and filamentous phytoplankton samples made the counting a formidable problem. Although many of these taxa could be identified, an accurate enumeration of the different forms was impossible. Only entire colonies and the larger filamentous forms were enumerated. Single or small numbers of cells resulting from possible fragmentation were not included in the counts. An alternative counting method would have been to count the individual cells; however, time and manpower restrictions prevented the accomplishment of this task during the project period.

It is possible that the actual densities of certain plankton in the samples may have been altered during the sediment removal process (see Section III.C.1.). Some of the colonial and/or filamentous forms could have become fragmented, and a few unicellular forms may have remained buried in the sediment. Because of the extreme care employed in washing the samples, it is doubtful that many organisms were lost. This modification would not have been employed had it not been necessary to obtain both qualitative and quantitative analyses.

Several zooplankton samples taken during the September 19-October 4, 1977, run contained large concentrations of bacteria and protozoans which were not completely killed by the preservative at the time the samples were collected. As a result, some decomposition of the organisms may have occurred between the time that the sample was collected, returned to the laboratory, and examined (two to three days). When subsequently added to the samples, the preservative was, in effect, "diluted out" by the unexpectedly high organic content in these samples. Partially decomposed organisms could not be accurately counted and were therefore omitted from the tabulations.

A final problem involved the calculation of the number of planktonic organisms per liter of river water sampled. The Alabama River throughout the study area is a lotic environment. Flow at each of the 46 stations was rapid and variably dependent upon a number of specific factors, including rainfall, location of site on slip bank or cut bank, river depth and width, bottom profile, and time of collection relative to electric generating periods. To determine the exact number of river water liters that passed through the plankton net, a velocity measurement was needed for each station at the exact time that each sample was collected. Unfortunately, the measurements were not requested by the scope

of work and flow data provided by the U.S. Army Corps of Engineers (tables 11 and 12) were not sufficient to make the necessary calculations. For this reason, the number of organisms had to be estimated as outlined in the discussion on methods (section B-1) with the results showing organism counts substantially lower than expected. Therefore, the results should be used only as a guide for showing what organisms are in the system.

2. Benthic Macroinvertebrates--Ponar

Five macroinvertebrate taxa frequently encountered during the study were selected to illustrate changes in population structure. Four taxa, the Chironomidae and *Hexagenia* (fig. 53), *Corbicula* (fig. 54) and *Chaoborus* (fig. 55), are known to be pollution tolerant (Cairns and Dickson, 1971). The remaining taxon, the Trichoptera or caddisflies (fig. 54), is pollution intolerant (Cairns and Dickson, 1971).

Very few conclusions can be drawn about the benthic fauna of the study area; however, several interesting observations, listed below, are worthy of recognition.

1. While the actual numbers of Chironomidae and *Hexagenia* found at most stations differed, there was a similarity in their density variation throughout the run (fig. 53).

2. Generally speaking, the densities of the pollution-tolerant species were greater than those of pollution-intolerant species. This is particularly true in the case of the Trichoptera and *Corbicula* (fig. 54).

3. There was a difference in the relative densities of *Chaoborus* between the first and third runs (fig. 55). This was probably due to seasonal variation. A similar response was noted for the phytoplankton and zooplankton (figs. 47 through 52).

4. Many of the taxa collected during the study exhibited a drop in density between stations 18 and 24 (river miles 230 to 200); the reason for this drop is unknown at this time. If this trend is again observed during the 1978 study, this area may deserve additional study.

Figure 56 is a plot of the Shannon-Weaver diversities calculated for the first and second biological runs. The third set of diversity values were family diversities and are not comparable to generic diversities. Therefore, they were omitted from the figure. It is significant to note that there was no real drop in the diversity from [illegible] mile 2[illegible] to 200. This tends to indicate that there are [illegible] in this area but none are really abundant.

Table 11.--Flow data (cubic feet per second) from Jones Bluff Lock and Dam for the period August 9 through December 8, 1977

(U.S. Army Corps of Engineers, Mobile District, 1978, Personal Communication)

Station number	August	September	October	November	December
1		7,926	22,012	22,492	31,401
2		7,027	13,075	22,565	28,432
3		3,657	14,363	22,833	31,582
4		1,484	14,067	18,498	36,322
5		4,427	14,325	53,084	22,808
6		3,532	15,794	64,517	16,421
7		6,139	14,492	61,596	21,707
8	11,254	6,128	12,408	62,368	27,107
9	10,179	7,832	26,597	62,312	
10	9,316	4,399	37,952	55,043	
11	7,392	11,449	36,080	48,292	
12	9,502	11,058	34,275	47,202	
13	5,542	11,749	28,629	39,684	
14	4,682	14,975	23,321	33,661	
15	9,313	15,546	22,363	33,695	
16	6,615	18,025	20,602	33,448	
17	5,708	19,263	19,031	32,440	
18	5,579	20,942	17,183	35,832	
19	6,987	16,347	11,513	31,735	
20	6,057	21,196	11,933	24,907	
21	1,760	21,176	9,543	22,599	
22	4,629	16,133	5,967	28,277	
23	9,771	14,508	3,570	31,328	
24	10,875	9,683	5,932	33,218	
25	10,346	6,191	16,886	30,770	
26	8,963	6,435	23,939	30,177	
27	7,043	9,054	48,025	29,958	
28	3,462	9,017	39,780	27,405	
29	5,203	10,246	39,360	28,321	
30	6,013	16,662	29,636	38,078	
31	7,025		23,047		

Table 12.--Flow data (cubic feet per second) from Millers Ferry Lock and Dam for the period August 9 through December 8, 1977

(U.S. Army Corps of Engineers, Mobile District, 1978, Personal Communication)

Station number	August	September	October	November	December
1		6,703	21,479	28,315	47,388
2		6,580	25,318	26,942	36,517
3		6,592	17,829	26,521	36,482
4		6,638	17,940	28,270	29,641
5		6,646	17,960	31,440	27,046
6		6,579	18,013	67,156	23,285
7		6,738	17,933	73,632	27,708
8	13,073	6,646	14,983	73,210	
9	10,842	12,255	23,479	72,504	
10	10,904	9,887	30,033	57,786	
11	9,742	12,817	47,027	54,640	
12	9,775	16,204	48,260	52,675	
13	8,677	13,217	35,284	48,428	
14	8,746	15,063	32,649	44,072	
15	9,829	16,457	30,529	37,255	
16	8,796	18,433	21,208	36,609	
17	6,767	21,425	20,959	36,547	
18	6,558	28,809	23,408	39,024	
19	6,617	22,529	15,025	43,005	
20	6,603	17,546	11,060	33,917	
21	6,508	24,344	9,846	29,921	
22	6,571	26,139	7,617	29,605	
23	6,396	20,013	7,750	29,602	
24	9,575	14,370	16,152	30,660	
25	13,154	9,136	28,354	39,845	
26	12,115	7,273	33,757	39,363	
27	8,800	10,006	57,221	32,541	
28	7,652	9,973	56,946	34,694	
29	6,601	10,574	4[illegible],941	32,710	
30	8,663	13,492	27,604	40,438	
31	6,613				

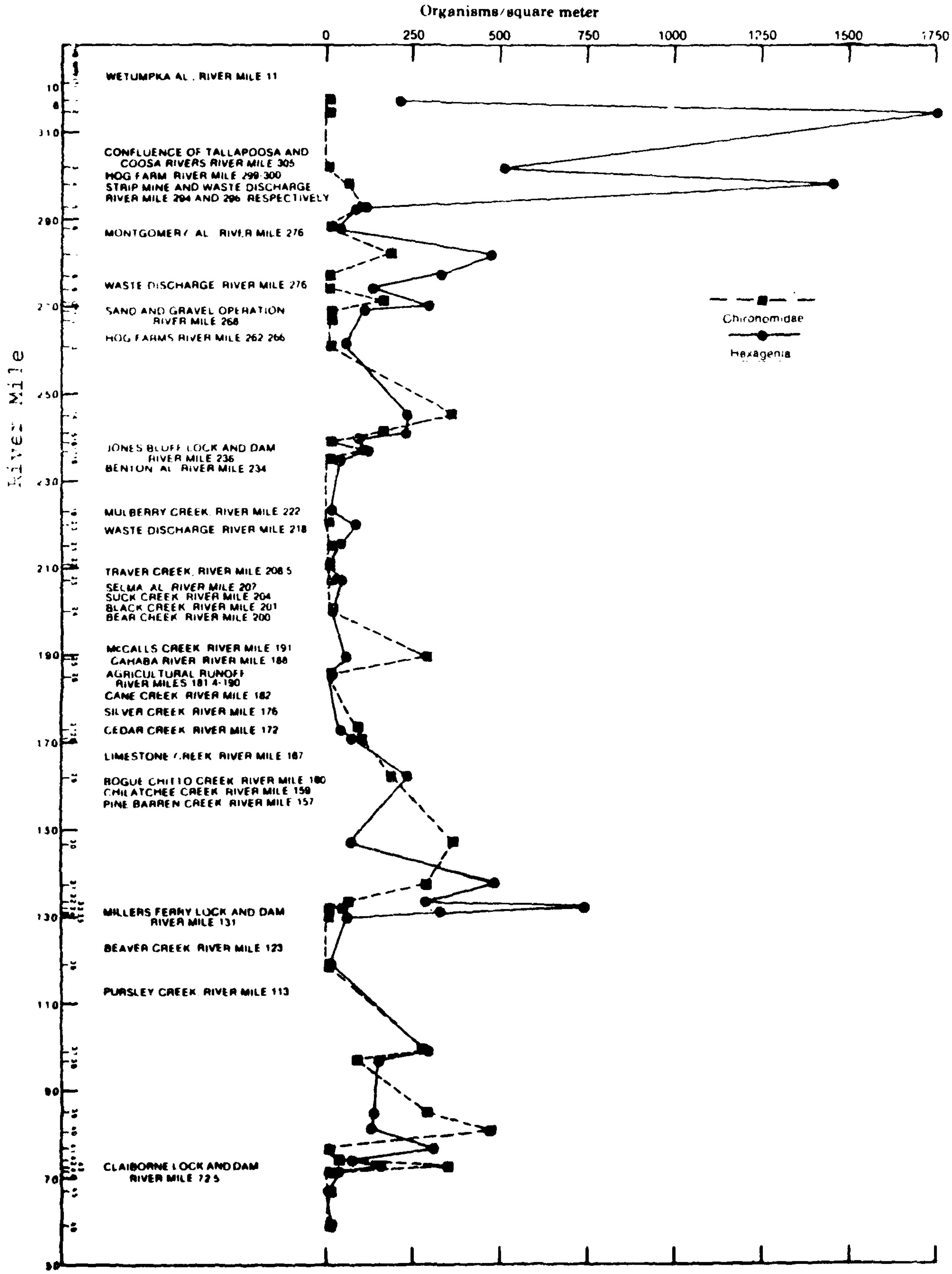
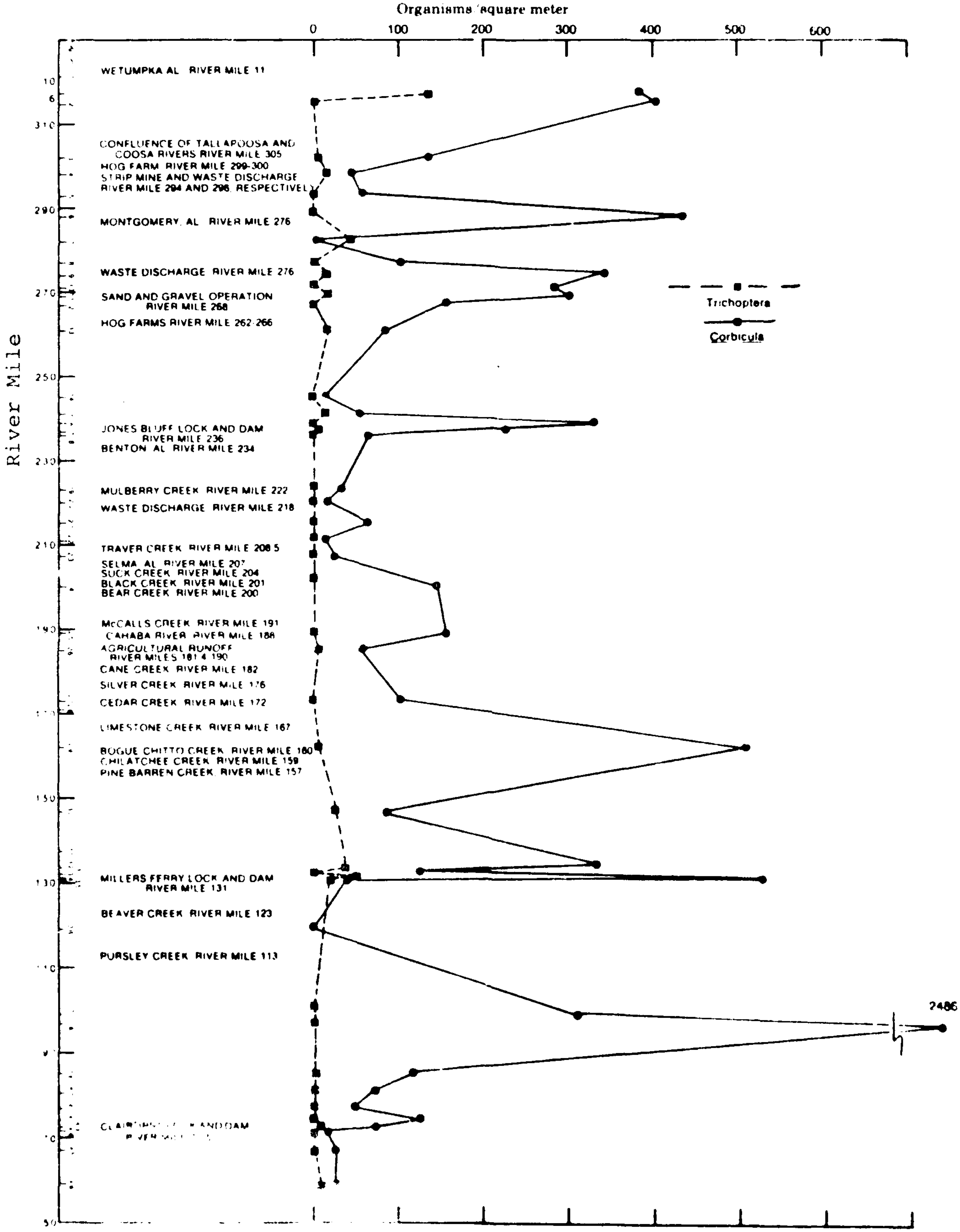


Figure 53.--Larval chironomid and nymphal *Hexagenia* densities at 46 Alabama-Coosa River system stations during the period October 31 through November 11, 1977. Each value is the average number of organisms contained in three samples taken at a station.



...sities at 46 Alabama-Coosa River system ...iod October 31 through November 11, 1977. ... value is the ... number of organisms contained in three samples taken at a station.

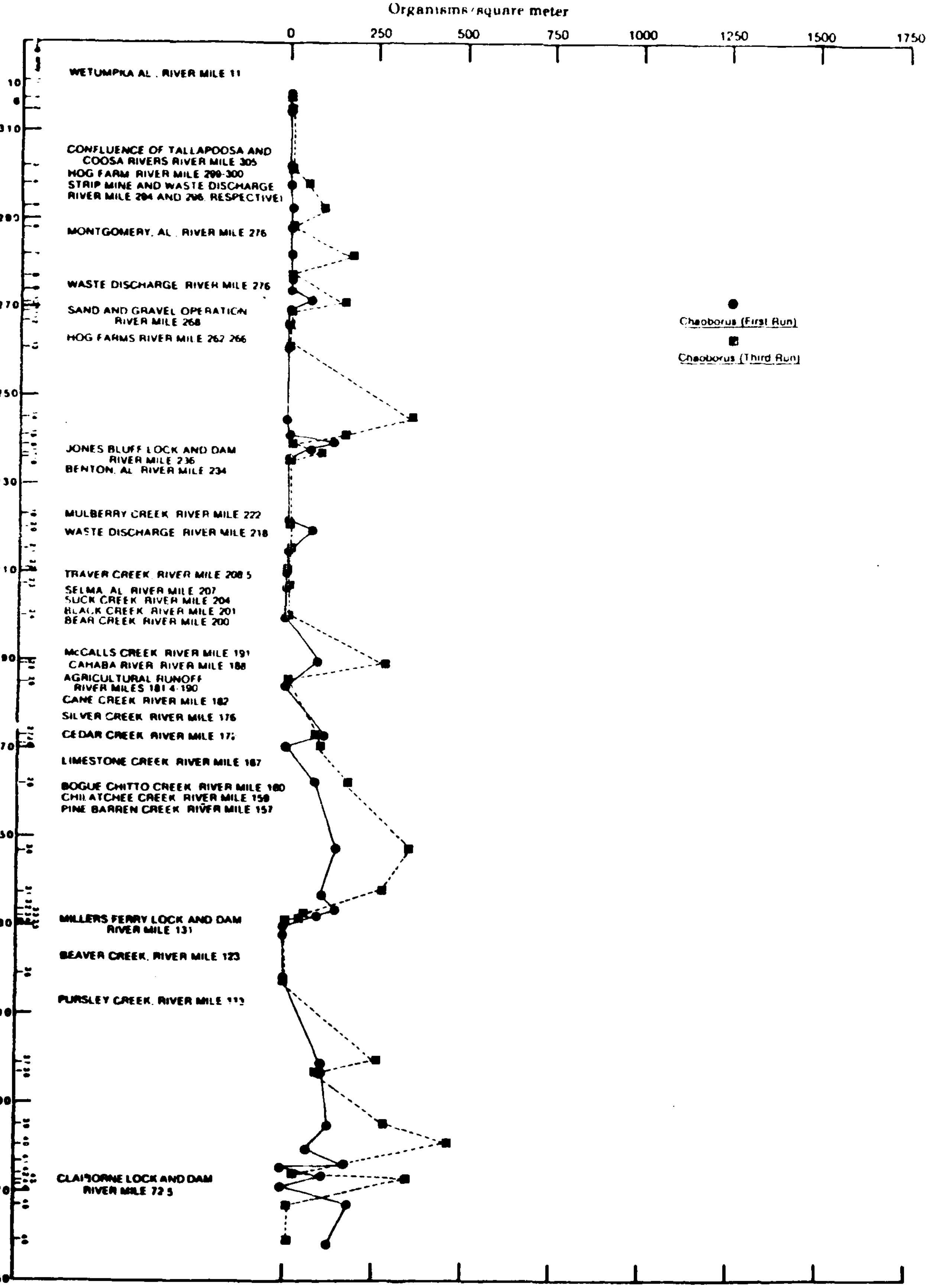


Figure 55.--*Chaoborus* density at 46 Alabama-Coosa River system stations during the periods August 9-25 and October 31 through November 11, 1977. Each value is the average number of organisms contained in three samples taken at a station.

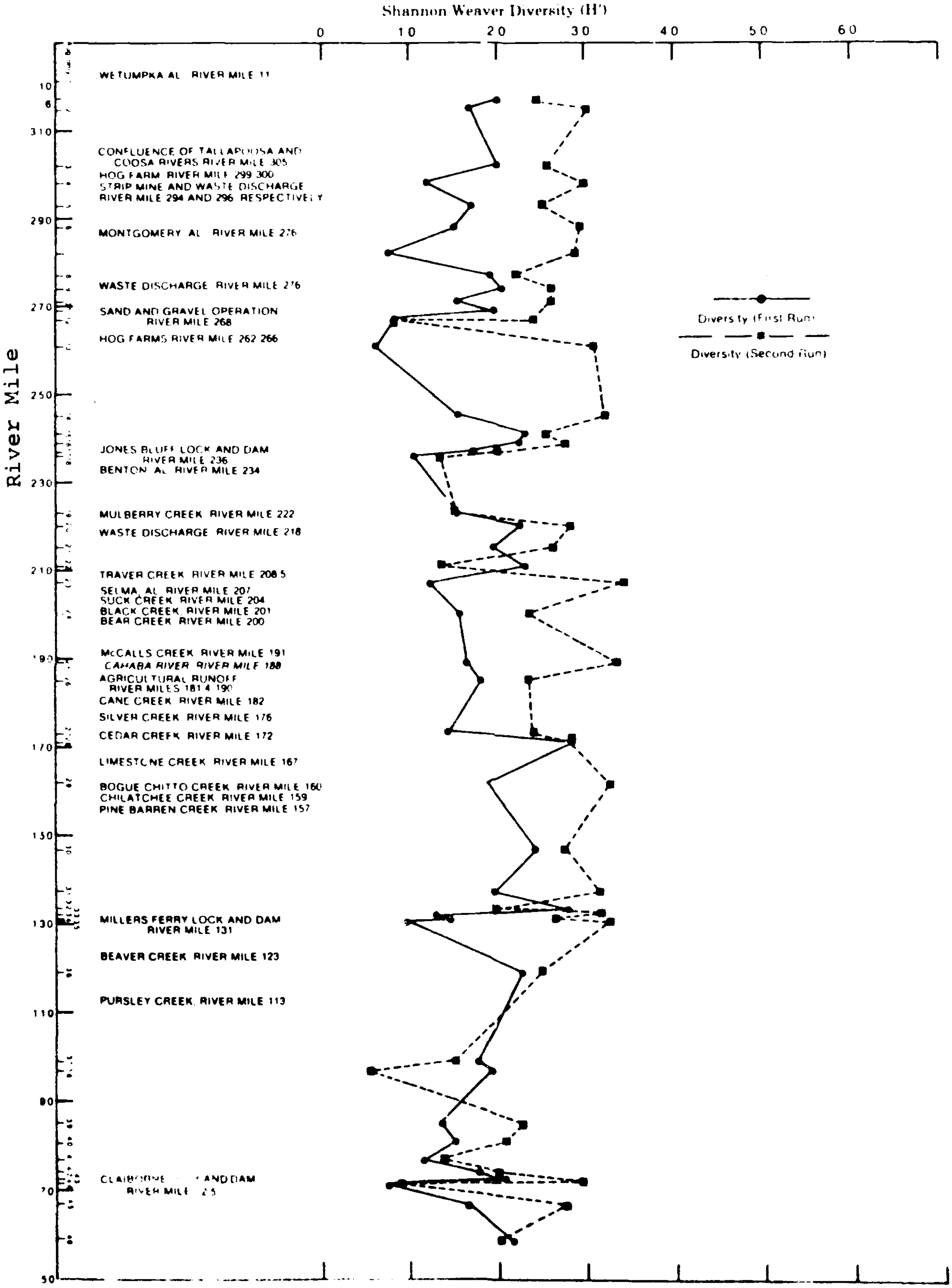


Figure 2?. Shannon-Weaver diversities for macroinvertebrate samples collected with a Ponar dredge at Alabama-Coosa River system stations during the periods August ?-2? and September 19 through October 4, 1977.

3. Benthic Macroinvertebrates--multiplate sampler

The studies of the multiplate samplers indicated that the Chironomidae was the dominant benthic family in the area. This confirms and supports the findings of the Ponar dredge samples.

4. Aquatic Macrophytes

The vegetation bordering the Alabama River is mostly deciduous forest, and *Quercus*, *Planera*, *Carya*, and *Taxodium* are the dominant genera. In general, the river proper is not infested with aquatic macrophytes. However, two areas, from Miller's Ferry Lock and Dam to mile 143 and from Jones Bluff Lock and Dam to mile 249, do have large concentrations of macrophytes. Dominant species include *Alternanthera philoxeroides*, *Eichhornia crassipes*, *Justicia americana*, *Ludwigia peploides*, and *Myriophyllum spicatum*. All of these occur in extensive colonies which could detrimentally affect recreation in the future. In the Alabama River, there probably is no need for concern that these plants will affect navigation since the river is deep and all except *Eichhornia crassipes* are rooted. The rooted species cannot survive in deep turbid waters similar to those of the river. The free-floating *Eichhornia* possibly can cause problems to navigation in areas just above dams where the species might get trapped and large colonies develop. No such colonies, however, were observed.

Alternanthera philoxeroides is a species which roots in shallow waters along the edges of the Alabama River. The decumbent stems float outward from shore forming floating mats, which often cover very large areas in protected bays and backwaters. This species is a major component in the two areas cited as having large infestations of aquatic plants. *A. philoxeroides* has been known to completely clog canals in Florida and Louisiana (Sculthorpe, 1967). This clogging of canals is possible because the canals are relatively narrow and the decumbent stems growing from each side can come into contact in the middle of the canal; therefore, they form a floating mat over the entire canal. This, however, probably will not occur on the Alabama River due to the width of the river. Thus, navigation probably will not be affected by this species. The species can, however, affect recreation in the river, as it now forms massive colonies in the bays and, as a result, can make fishing more difficult.

Eichhornia crassipes is a species whose stems float on the surface of the water but do not penetrate into the substrate. The petioles are greatly inflated with large development of arenchyma. The species is a major component of only the community near Millers

Ferry Lock and Dam. *Eichhornia crassipes* is notorious in Florida and Louisiana, covering lakes, canals, and rivers (Sculthorpe, 1967). Since the species is free-floating, it is moved by the wind and current. Large colonies were observed trapped in bays on the Alabama River. The species could possibly be trapped above a dam and cause problems with navigation.

Justicia americana is a species which roots in shallow waters along the edges of the Alabama River. The decumbent stems float outward from shore forming floating mats, which often cover very large areas in protected bays and backwaters. The species is a major component in the two areas cited as having large infestations of aquatic vascular plants. *Justicia* has not been considered to directly affect navigation or recreation. However, Penfound (1940) indicates that large populations of the species can serve as breeding grounds for noxious insects and, therefore, indirectly affect recreation.

Ludwigia peploides (also often called *Jussiaea repens*) is a species which roots in shallow waters along the edges of the Alabama River. The decumbent stems float outward from shore forming floating mats, which often cover very large areas in protected bays and backwaters. This species is a major component in the two areas cited as having large infestations of aquatic vascular plants. *Ludwigia* has been known to completely clog canals in various parts of the world (Chomchalow and Pongpangan, 1976). This clogging of canals is possible because the canals are relatively narrow and the decumbent stems growing from each side can come into contact in the middle of the canal; therefore, they form a floating mat over the entire canal. This, however, probably will not occur on the Alabama River due to the width of the river. Thus, navigation probably will not be affected by this species. The species, however, can affect recreation because it now forms massive colonies in the bays and, as a result, can make fishing more difficult.

Myriophyllum spicatum is a submersed species with whorled, deeply divided, pinnately compound leaves. The species forms relatively large colonies in shallow (to 2 feet in depth) water. The species is a major component of only the community near Millers Ferry Lock and Dam. *M. spicatum* is becoming very abundant in the northeastern and north-central United States where it is causing considerable recreation problems (Coffey and McNabb, 1974). Since the species is submersed and the Alabama River is too deep and turbid for plant growth at depths greater than 2 or 3 feet, the species poses no problem to navigation. The species can, however, affect recreation because it now forms massive colonies in the bays and, as a result, can make fishing more difficult.

It should be emphasized that the annotated list of aquatic plants (table D-2) includes only the locality at which a species was observed and no attempt was made at quantification. Some species, for example *Ammannia coccinea*, are known from many localities, but there are few individuals per locality; whereas others, for example *Eichhornia crassipes*, occur in relatively few places but have thousands of plants per locality. These latter, potentially noxious, species are probably of more importance in reservoir management, but the data do not so indicate because quantitative data were not required by the study.

VI. SUMMARY

Water quality, biological and sediment samples were collected at 46 Alabama River stations on a continuous 3-week schedule between August 8 and December 8, 1977. The samples were returned to the laboratory, analyzed, and the data tabulated. Selected data were submitted to the U.S. Environmental Protection Agency for inclusion into their STORET retrieval system. Other data were vertically profiled or graphically depicted by river mile and station number.

The chemical quality of the water tested, with few exceptions, varied slightly from station to station. Based on isopleth data compiled above each dam on the Alabama River, there was no stratification observed during this study period. The Alabama River appears to be a fast-moving lotic-type water that is well-mixed in regards to chemical and temperature characteristics. The water was found to be predominantly of the calcium-magnesium carbonate type. The nutrient ion ammonia as nitrogen was above establisned standards at almost every station along the river and needs further investigation. Pesticides in the sediment also need closer monitoring. Overall, the chemical quality of the water is good.

Sediment quality data (which included 11 metals and 29 pesticide species) was collected once during the study period from all 46 sampling stations. The sediment data indicated areas of high total magnesium, iron, and manganese levels. Also, residues of certain pesticides indicated areas that were fairly high, especially at stations 13 and 17. Of those residues detected, Aldrin, DDT, and two PCB's (Arochlor 1254 and 1260) occurred in the highest concentration. The pesticide DDT was detected in 20 of the 46 sediment stations samples. The concentrations of arsenic, cadmium, chromium, copper, lead, mercury, nickel and zinc fell within normal background limits as compared to 10 years of USGS water quality and sediment data.

Biological organisms identified during the study included 119 plankton taxa, 134 benthic macroinvertebrate taxa and 76 macrophyte species. Phytoplankters most commonly encountered, in order of decreasing abundance, were green algae, diatoms, and blue-green algae. Zooplankters most commonly encountered, in order of decreasing abundance, were crustaceans, rotifers, and protozoans. The division Chlorophyta contained the highest diversity (29 genera) of any plankton

group encountered. Phytoplankton organism counts during the study may have been exceptionally low because of the required use of a Wisconsin plankton net with an 80-micron aperture mesh as a collection device as opposed to collecting whole water samples. Another probable result of using the Wisconsin net was the fragmentation of colonial and filamentous forms which made quantification difficult. Perhaps the most serious problem encountered during the plankton study involved the lack of accurate flow data for each station, which made accurate tabulation of organisms per liter of water sampled impossible.

The chironomids (class Insecta) were the dominant group of benthic macroinvertebrates found in both the Ponar and multiplate samples. Next in abundance were the annelids and the mollusks. By weight, *Corbicula* clams were the dominant organism in the Ponar samples. Throughout the study, pollution tolerant taxa were encountered more frequently than pollution intolerant taxa. One particular area (river miles 200 to 230) exhibited a drop in the density of several benthic taxa but no drop in the Shannon-Weaver diversity values. This seems to indicate that a reasonable number of taxa were present but in low numbers of individuals for each taxa. The reasons for this condition are unknown at this time.

Field investigations conducted at 276 sites between the confluence of the Coosa and Tallapoosa Rivers and Claiborne Lock and Dam revealed the presence of 76 species of aquatic plants comprising 43 families. Dominant species included *Alternanthera philoxeroides*, *Eichhornia crassipes*, *Justicia americana*, *Ludwigia peploides*, and *Myriophyllum spicatum*. Two areas were investigated that contained particularly large concentrations of macrophytes: Millers Ferry Lock and Dam to river mile 143 and Jones Bluff Lock and Dam to river mile 249.

VII. RECOMMENDATIONS

Based upon our experiences on the Alabama and Coosa Rivers in 1977, we submit the following recommendations for future studies:

1. Plankton are a very important biological constituent in the Alabama River; however, populations of these organisms are subject to a number of short-term fluctuations depending upon time of collection during the day, the time of the year, seasonal variation, rainfall and associated flooding, and water quality. One additional factor which significantly affected the outcome of our analyses was the rapid flow of the Alabama River. For these reasons and due to some duplication of data obtained at consecutive stations, the total number of stations for plankton studies could be reduced by 20 percent.

2. Flow data should be obtained at each site when samples are collected. Velocity at the point of collection should be an important part of the record and would provide good baseline information.

3. The fish fauna of any reservoir is an important biological component and needs to be investigated in future studies. Fishes feed upon both plankton and benthic macroinvertebrates; therefore, drastic long-term fluctuations in the supply of these food sources should be reflected in the diversity of the ichthyofauna. Fishes may also indicate the quality of water in a stream.

4. Pesticide residues showed up more significantly in the sediment samples as opposed to the water samples. More emphasis needs to be placed on selected pesticides based on usage in the area and long-term lives of metabolites. We recommend that cross-sectional benthic bed-material samples be collected and composited throughout the study area with special emphasis on tributaries draining from agricultural, industrial, and urban areas.

5. We recommend that tributary sites on the Alabama River be incorporated into the Phase II work scheduled. Field parameters such as dissolved oxygen, temperature, conductivity, and pH should be performed at mid-depth at the sites.

6. *Corbicula* (clam) tissue, which is present at most stations on the river, needs to be examined for heavy metals and pesticide residues during Phase II operations.

7. Special studies of diurnal and diel parameters such as dissolved oxygen and temperature should be carried out at least once during the Phase II study to determine any possible nocturnal effects.

8. Special nutrient studies of tributaries and sites above and below urbanized areas might also be considered for future post-impoundment projects.

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APPENDIX A

Water-quality and Biological STORET Data and Isopleth Graphs

Table A-1.--Water-quality data from the Alabama-Coosa Rivers system for the period August 9 through December [illegible] 1977

Station Number 1

STATION - 02411605 COOSA R NR MONTGOMERY ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770809	0830	29.0	10.0	1.8	15	100	121	6.6	0.3	8.0
770829	1000	29.0	21.0	1.4	40	240	81	8.0	0.5	
770919	1245	21.0	25.0	0.8	60	160	156	8.5	0.9	
771011	1250	17.0	15.0	0.9	60	230	203	10.6	0.5	
771031	1215	12.5	35.0	0.9	80	220	168	9.8	0.0	266.0
771121	1430	9.0	55.0	0.1	140	240	114	11.3	0.5	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770809	0830	6.7	48.4	0.00	0.10	0.09	0.18	0.01	1.3	43
770829	1000	7.8	27.9	0.04	0.17	0.09	0.20	0.00	2.2	30
770919	1245	7.6	57.4	0.12	0.72	0.14	0.01	0.00	2.2	58
771011	1250	6.8	60.7	1.50	0.22	[illegible]	0.13	0.03	3.6	63
771031	1215	6.7	45.9	0.00	[illegible]	[illegible]	0.14	0.12	4.4	55
771121	1430	7.3	36.9	0.00	[illegible]	[illegible]	0.10	0.08	6.7	40

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	[illegible] SILICA DISSOLVED MG/L	[illegible] IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770809	0830	11.0	3.8	6.4	6.0	[illegible]	[illegible]	0	55	0.00
770829	1000	7.4	2.7	5.0	5.0	6.2	[illegible]	50	67	12.0
770919	1245	15.0	5.8	8.2	6.0	4.1	[illegible]	20	160	5.0
771011	1250	15.0	6.1	8.0	9.0	3.9	[illegible]	50	130	5.0
771031	1215	14.0	4.8	7.6	9.0	7.7	[illegible]	40	70	10.0
771121	1430	11.0	0.0	5.6	8.4	6.9	[illegible]	70	65K	5.0K

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	[illegible] CHLRPHYL B UG/L	[illegible] CHLRPHYL C UG/L	[illegible] MG/L	70300 RESIDUE DISS-180 C MG/L
770809	0830	89000	6	40	2.8	[illegible]	14.0	6	87
770829	1000	4100	37	14	9.2	3.7	5.9	3	66
770919	1245	3600	50	260	8.0	4.3	[illegible]	11	[illegible]
771011	1250	530	38	78	2.5	[illegible]	0.4	11	125
771031	1215	1200	24	51	5.8	[illegible]	10.0	13	78
771121	1430	5400	43	110	4.8	4.3	13.0	22	70

Table A-1.--Continued

Station Number 2

STATION - 02419965 COOSA R BELOW MORTARCH NR ELMORE ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770809	0910	28.5	40.0	1.1	100	180	103	7.8	0.7	9.0
770829	1100	28.0	29.0	1.0	62	220	110	8.2	0.5	
770919	1530	21.0	25.0	0.8	75	160	154	8.1	1.0	
771011	1315	17.0	[illegible]	0.9	85	220	205	10.6	0.5	
771031	1400	13.0	[illegible]	0.1	90	220	181	9.2	0.0	62.0
771121	1450	10.0	45.0	0.6	150	240	112	11.1	0.2	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770809	0910	6.3	36.1	0.00	0.18	0.09	0.09	0.00	1.8	33
770829	1100	7.4	36.9	0.14	0.29	0.05	0.11	0.00	1.5	37
770919	1530	7.7	59.0	0.18	0.83	0.14	0.02	0.00	3.2	58
771011	1315	6.6	54.9	0.17	0.17	0.17	0.07	0.03	1.8	65
771031	1400	6.5	49.2	0.00	0.12	0.37	0.15	0.13	3.0	52
771121	1450	7.3	36.9	0.01	0.14	0.40	0.10	0.03	4.0	40

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770809	0910	8.0	3.0	5.0	4.4	6.2	[illegible]	30	85	0.00
770829	1100	9.4	3.3	5.2	2.8	6.1	[illegible]	30	73	0.00
770919	1530	15.0	6.0	9.0	5.0	4.3	570	10	190	5.0K
771011	1315	16.0	6.0	8.4	9.0	4.5	[illegible]	130	120	5.0
771031	1400	13.0	4.6	6.8	8.0	7.2	[illegible]	40	95	11.0
771121	1450	11.0	3.0	5.0	9.0	6.4	[illegible]	150	68	5.0K

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP ST 105 C MG/L	70300 RESIDUE DISS-180 C MG/L
770809	0910	84000	34	36	4.2	[illegible]	6.5	24	82
770829	1100	3400	33	12	14.0	[illegible]	4.0	0	79
770919	1530	10000	30	280	7.4	[illegible]	9.2	13	85
771011	1315	5200	65	73	7.5	[illegible]	46.0	18	110
771031	1400	3300	24	69	8.3	11.0	36.0	10	90
771121	1450	3100	33	54	6.7	[illegible]	22.0	13	87

Table A-1.--Continued

Station Number 3

STATION - 02419980 ALA R AT COOSADA FERRY NR MONT. ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770809	1030	29.0	20.0	1.0	120	190	116	12.0	1.1	6.0
770829	1300	28.0	30.0	0.8	69	210	90	8.3	0.7	
770919	1645	21.0	35.0	0.8	140	180	150	8.7	1.1	
771011	1430	17.0	10.0	0.9	30	220	170	10.4	0.4	
771031	1515	13.0	25.0	0.8	100	240	178	9.0	0.0	82.0
771121	1510	10.0	30.0	0.6	150	230	105	11.2	0.2	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770809	1030	6.4	41.0	0.00	0.10	0.01	0.07	0.02	1.9	37
770829	1300	7.5	30.3	0.10	0.16	0.09	0.08	0.01	1.7	31
770919	1645	7.5	45.9	0.02	0.57	0.12	0.05	0.02	6.6	51
771011	1430	6.4	45.1	0.33	0.11	0.20	0.04	0.02	2.4	55
771031	1515	6.5	45.9	0.03	0.16	0.35	0.15	0.11	4.0	52
771121	1510	7.3	36.1	0.01	0.08	0.39	0.05	0.04	15.0	40

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770809	1030	9.2	3.3	5.2	5.6	6.4	320	30	53	7.0
770829	1300	7.6	2.8	4.8	5.0	6.4	420	30	82	0.00
770919	1645	13.0	5.2	7.6	5.0	4.5	310	20	110	25.0
771011	1430	13.0	5.4	7.6	5.2	4.9	390	150	130	11.0
771031	1515	13.0	4.6	6.0	10.4	8.2	1000	110	85	8.0
771121	1510	11.0	2.9	5.6	6.0	5.8	51	210	68	21.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770809	1030	49000	21	29	9.7	5.6	22.0	15	66
770829	1300	1100	38	61	15.0	2.4	4.2	[illegible]	64
770919	1645	[illegible]	29	600	8.[illegible]	2.6	4.9	30	[illegible]
771011	1430	[illegible]	140	180	8.4	[illegible]	22.0	[illegible]	[illegible]
771031	1515	[illegible]	[illegible]	61	11.0	[illegible]	54.0	12	[illegible]
771121	1510	3700	[illegible]	25	9.5	[illegible]	40.0	[illegible]	[illegible]

Table A-1.--[illegible]

Station Number 4

STATION - 02419983 ALA R NR CHISOLM ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	[illegible] CONDUCTVY FIELD MICROMHO	[illegible] DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770809	1145	29.5	40.0	0.8	70	140	99	10.9	1.6	6.5
770829	1430	29.0	18.0	0.9	65	0	102	8.0	0.7	
770920	1030	20.0	30.0	0.8	110	140	150	3.3	0.7	
771011	1500	17.0	15.0	0.8	40	220	181	10.2	0.6	
771031	1550	13.0	30.0	0.8	90	240	174	9.2	0.0	116.0
771121	1530	9.0	50.0	0.6	80	240	108	10.9	0.4	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770809	1145	6.4	39.4	0.00	0.16	0.06	0.08	0.01	0.9	33
770829	1430	7.7	36.1	0.09	0.17	0.02	0.07	0.00	1.9	35
770920	1030	7.2	46.7	0.01	0.48	0.16	0.34	0.00	6.7	47
771011	1500	6.5	45.1	0.01K	0.20	0.20	0.13	0.03	2.3	61
771031	1550	5.8	45.1	0.04	0.24	0.27	0.09	0.05	3.4	49
771121	1530	7.3	34.4	0.00	0.08	0.39	0.08	0.05	3.6	40

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	[illegible] [illegible] TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770809	1145	8.1	3.0	4.2	2.6	6.6	[illegible]	30	69	0.00
770829	1430	8.6	3.2	5.2	14.0	5.8	340	30	79	0.00
770920	1030	12.0	4.9	8.4	6.0	5.0	[illegible]	10	170	28.0
771011	1500	15.0	5.7	7.2	10.4	5.6	[illegible]	[illegible]	170	[illegible]
771031	1550	12.0	4.6	6.4	11.0	7.5		[illegible]	91	14.0
771121	1530	11.0	2.9	4.6	6.2	5.6	[illegible]		76	31.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLPHYL A UG/L	32212 CHLPHYL B UG/L	[illegible] CHLPHYL C UG/L	[illegible]	[illegible] RESIDUE [illegible] MG/L
770809	1145	190000	40	23	13.0	[illegible]	[illegible]	[illegible]	[illegible]
770829	1430	[illegible]	12	17	17.0	[illegible]	[illegible]	[illegible]	[illegible]
770920	1030	[illegible]	0	1700	6.2	[illegible]	[illegible]	[illegible]	110
771011	1500	10000	[illegible]	[illegible]	6.3	[illegible]	[illegible]	[illegible]	[illegible]
771031	1550	4800	24	54	5.0		[illegible]	[illegible]	[illegible]
771121	1530	2800	32	[illegible]	5.9		[illegible]	7	65

Table A-1.--Continued

Station Number 5

STATION - 02419988 ALA R AT L&N RR NR MILLBROOK ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770809	1400	29.5	30.0	1.0	70	110	107	9.4	1.3	7.0
770829	1700	29.0	18.0	1.1	65	220	110	8.3	0.3	
770920	1130	20.0	25.0	0.8	95	140	163	8.0	0.5	
771011	1600	17.0	45.0	1.0	40	230	181	10.2	0.7	
771101	0955	12.0	35.0	0.8	95	230	165	10.7	0.0	78.0
771121	1550	9.0	40.0	0.6	90	240	108	10.8	0.5	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770809	1400	6.5	42.6	0.00	0.18	0.01	0.07	0.00	1.4	33
770829	1700	7.4	36.9	0.09	0.19	0.10	0.01	0.00	2.0	38
770920	1130	7.2	50.0	0.02	0.95	0.15	0.29	0.00	3.4	50
771011	1600	6.5	45.0	0.24	0.14	0.15	0.12	0.00	3.2	50
771101	0955	7.7	45.1	0.07	0.22	0.63	0.15	0.12	3.1	36
771121	1550	7.3	34.4	0.03	0.10	0.40	0.05	0.02	6.3	37

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770809	1400	8.1	3.0	5.2	5.0	7.9	270	60	53	0.00
770829	1700	9.8	3.3	6.4	3.4	5.8	330	20	78	0.00
770920	1130	12.0	5.4	6.4	7.0	5.2	500	20	100	5.0K
771011	1600	12.0	4.9	7.6	8.0	3.8	420	40	150	19.0
771101	0955	9.4	4.2	3.6	18.0	8.2	1400	150	89	13.0
771121	1550	10.0	2.9	5.2	8.0	6.0	1500	130	87	5.0K

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770809	1400	63000	34	30	17.0	2.8	2.9	14	63
770829	1700	1000	8	22	15.0	2.7	3.3	8	77
770920	1130	10000	240	2000	7.0	3.4	8.7	24	122
771011	1600	760	160	170	5.4	1.2	3.2	5	122
771101	0955	[illegible]	26	80	6.9	6.1	25.0	16	121
771121	1550	4200	42	32	6.5	[illegible]	29.0	5	87

Station Number 6

Table A-1.--Continued

STATION - 02419987 ALA R AT HWY 143 NR MONTGOMERY ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX OHP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770811	0905	28.0	30.0	0.8	110	180	105	9.4	0.3	11.0
770830	0900	26.0	19.0	1.1	50	210	96	8.2	0.0	
770920	1545	21.0	40.0	0.8	90	120	166	8.0	0.4	
771012	0950	16.0	20.0	0.9	85	210	179	10.6	0.1	
771101	1050	12.5	35.0	0.8	100	230	178	10.8	0.0	118.0
771122	1010	9.0	60.0	0.6	130	230	104	13.4	0.0	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770811	0905	6.4	39.4	0.00	0.22	0.06	0.06	0.00	0.9	36
770830	0900	7.5	35.3	0.14	0.31	0.06	0.26	0.01	1.9	32
770920	1545	7.3	49.2	0.00U	0.35	0.16	0.13	0.00	3.1	49
771012	0950	6.4	50.8	0.02	0.18	0.25	0.04	0.00	1.9	54
771101	1050	7.7	56.6	0.28	0.11	0.30	0.13	0.12	3.5	49
771122	1010	7.4	37.7	0.01	0.08	0.41	0.05	0.02	36.0	40

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770811	0905	9.0	3.2	5.0	4.8	[illegible]	[illegible]	20	53	5.0U
770830	0900	8.0	2.9	5.4	4.0	4.9	[illegible]	10	[illegible]	0.0U
770920	1545	12.0	5.2	8.6	6.6	4.3	270	30	110	5.0K
771012	[illegible]50	14.0	4.6	7.4	8.0	4.2	200	90	130	6.0
771101	[illegible]50	12.0	4.6	7.6	11.0	6.0	900	80	92	17.0
771122	1010	11.0	2.9	4.4	7.0	5.6	1100	160	76	29.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RESIDUE SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770811	0905	13000	15	19	17.0	[illegible]	25.0	14	66
770830	0900	460	6	20	12.0	2.3	2.8	0	67
770920	1545	16000	2600	1200	7.4	3.5	10.0	10	90
771012	0950	7600	150	180	7.1	[illegible]	19.0	31	97
771101	1050	3700	24	82	8.8	11.0	35.0	9	118
771122	1010	4800	130	50	5.2	5.0	17.0	12	0

Station Number 7

Table A-1.--Continued

STATION - 02419989 ALA R NR MAXWELL AFB NR MONT. ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770811	1030	28.5	30.0	0.9	70	200	110	8.7	1.1	8.0
770830	1030	28.5	20.0	1.1	42	220	107	7.4	0.4	
770920	1645	21.0	45.0	0.8	100	120	165	8.3	0.5	
771012	1025	16.0	20.0	1.0	85	230	176	10.2	0.5	
771101	1300	13.0	25.0	0.8	90	230	188	10.6	0.0	120.0
771122	1040	9.0	40.0	0.6	150	230	108	13.0	0.0	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770811	1030	6.4	39.4	0.00	0.14	0.05	0.11	0.04	1.1	37
770830	1030	7.4	37.7	0.11	0.19	0.08	0.21	0.01	1.2	35
770920	1645	7.4	48.4	0.15	0.30	0.15	0.39	0.00	3.2	45
771012	1025	6.8	51.7	0.03	0.17	0.23	0.07	0.06	1.8	50
771101	1300	7.9	48.4	0.00	0.16	0.39	0.17	0.12	3.7	44
771122	1040	7.3	35.3	0.03	0.20	0.42	0.13	0.05	3.8	39

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770811	1030	9.4	3.2	5.8	4.8	7.1	380	20	61	0.00
770830	1030	8.8	3.2	6.6	3.4	4.9	340	10	75	0.00
770920	1645	11.0	5.0	9.8	8.4	3.3	430	30	150	32.0
771012	1025	12.0	4.8	7.4	8.4	4.4	250	140	170	12.0
771101	1300	9.8	4.5	8.0	9.0	7.8	870	100	83	14.0
771122	1040	11.0	2.8	5.2	3.0	5.9	1200	150	72	36.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770811	1030	1800	100	450	17.0	19.0	65.0	14	65
770830	1030	18000	370	3500	11.0	3.2	3.1	5	69
770920	1645	17000	2900	900	9.7	4.8	12.0	22	92
771012	1025	[illegible]	150	240	18.0	20.0	66.0	10	99
771101	1300	23000	360	[illegible]	6.4	5.9	19.0	42	123
771122	1040	17000	[illegible]	1500	5.4	4.9	18.0	16	70

Table A-1.--Continued

Station Number 8

STATION - 02420045 ALA R NR PRATTVILLE ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770811	1700	29.5	25.0	0.8	80	210	119	10.8	1.5	6.0
770830	1255	29.0	15.0	0.0	45	200	122	8.0	0.0	
770920	1800	21.0	50.0	0.8	110	110	155	8.1	1.1	
771012	1100	16.0	40.0	0.9	50	230	171	10.2	0.5	
771101	1340	12.5	55.0	0.8	85	220	180	9.9	0.0	166.0
771128	1130	8.0	30.0	0.8	100	110	92	11.2	0.8	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770811	1700	7.2	41.0	0.00	0.23	0.09	0.11	0.00	0.8	49
770830	1255	7.5	41.0	0.11	0.20	0.09	0.15	0.01	1.7	39
770920	1800	7.3	48.4	0.03	0.32	0.16	0.23	0.03	3.0	47
771012	1100	7.1	49.2	0.16	0.18	0.17	0.07	0.00	1.6	57
771101	1340	7.9	50.0	0.37	0.16	0.37	0.16	0.12	2.9	44
771128	1130	7.0	27.9	0.00	0.04	0.34	0.05	0.03	4.7	30

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770811	1700	14.0	3.3	4.0	5.4	[illegible]	650	30	87	6.0
770830	1255	9.7	3.6	6.6	4.4	5.5	[illegible]	60	63	6.0
770920	1800	12.0	4.8	8.6	4.0	3.2	420	20	160	12.0
771012	1100	15.0	4.6	8.0	7.2	5.2	340	70	170	18.0
771101	1340	10.0	4.5	6.0	11.2	4.8	[illegible]	30	98	18.0
771128	1130	8.2	2.2	3.6	6.0	10.0	[illegible]	[illegible]	82	26.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770811	1700	74000	340	150	7.8	[illegible]	4.1	30	76
770830	1255	27000	16	76	8.1	1.5	2.1	9	78
770920	1800	22000	0	1300	11.0	6.3	18.0	6	87
771012	1100	7400	190	[illegible]	4.7	[illegible]	9.0	5	99
771101	1340	12000B	540	20000B	12.0	15.0	51.0	24	101
771128	1130	3600	75	320	3.7	2.9	10.0	11	57

Table A-1.--Continued

Station Number 9

STATION - 02420600 ALA R BELOW AUTAUGA CR NR PRATVL ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770812	0740	28.5	10.0	1.0	30	130	107	9.0	0.0	6.5
770830	1550	29.0	52.0	1.1	45	200	108	8.2	1.0	
770921	0900	20.5	40.0	1.0	90	120	155	8.0	1.3	
771012	1330	16.0	40.0	0.9	65	240	172	10.2	0.6	
771101	1355	12.5	35.0	0.8	90	230	181	10.2	0.0	148.0
771128	1205	8.0	50.0	0.8	140	80	87	11.0	0.1	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770812	0740	7.7	98.4	0.00	0.09	0.07	0.11	0.01	1.4	36
770830	1550	7.4	34.4	0.09	0.22	0.11	0.78	0.05	1.3	34
770921	0900	7.0	46.7	0.03	0.96	0.16	0.23	0.04	4.9	48
771012	1330	7.2	54.1	0.16	0.21	0.18	0.07	0.00	1.4	54
771101	1355	7.7	47.6	0.18	0.04	0.37	0.15	0.15	2.7	52
771128	1205	7.3	27.9	0.00	0.08	0.34	0.09	0.05	4.0	29

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770812	0740	9.2	3.2	6.0	3.8	6.6	450	30	52	0.0U
770830	1550	8.5	3.1	6.4	4.4	5.0	460	40	61	0.0U
770921	0900	12.0	5.0	7.6	7.4	3.6	680	30	81	10.0
771012	1330	14.0	4.6	7.8	8.0	4.3	350	30	140	5.0K
771101	1355	13.0	4.6	8.0	8.4	5.5	1100	20	97	22.0
771128	1205	8.1	2.2	4.0	4.0	9.1	1200	250	85	27.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770812	0740	40000	110	52	8.1	8.2	27.0	20	70
770830	1550	5300	170	69	7.3	2.3	5.1	5	65
770921	0900	8000	650	410	6.4	4.5	12.0	5	59
771012	1330	8200	720	420	7.8	7.3	26.0	4	96
771101	1355	27000B	1100	25000B	8.3	11.0	36.0	0	113
771128	1205	4100	180	130	5.8	7.2	27.0	6	57

Table A-1.--Continued

Station Number 10

STATION - 02421060 ALA R BELOW CATOMA CR NR PRATVL ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770812	0905	29.0	50.0	1.0	50	140	104	8.7	1.5	11.0
770831	0815	28.0	15.0	0.0	70	210	114	6.8	0.5	
770921	0945	20.5	40.0	0.6	100	130	158	8.0	0.5	
771012	1350	16.0	20.0	0.9	55	240	176	9.7	0.6	
771101	1530	13.0	15.0	0.8	75	190	178	9.3	0.0	106.0
771128	1215	8.0	40.0	0.8	120	90	95	11.0	0.7	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770812	0905	7.4	32.8	0.00	0.11	0.06	0.10	0.05	0.9	35
770831	0815	7.3	37.7	0.10	0.20	0.09	0.07	0.03	1.4	38
770921	0945	7.3	48.4	0.02	0.63	0.17	0.63	0.04	3.2	50
771012	1350	7.2	50.0	0.37	0.33	0.23	0.10	0.06	1.7	0
771101	1530	7.4	47.6	0.00	0.18	0.48	0.32	0.09	2.8	46
771128	1215	7.2	30.3	0.02	0.04	0.35	0.06	0.05	5.4	32

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770812	0905	8.9	3.1	5.2	4.8	5.3	180	30	3	3.0
770831	0815	9.6	3.3	6.8	5.4	5.8	340	30	58	18.0
770921	0945	13.0	5.0	8.2	6.6	5.1	730	20	110	26.0
771012	1350	14.0	4.8	0.1	0.1	3.4	340	30	150	5.0K
771101	1530	11.0	4.5	5.8	12.4	6.9	850	40	65	24.0
771128	1215	9.1	2.3	4.8	3.0	8.7	1000	140	78	17.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32216 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770812	0905	54000	70	43	5.9	3.4	7.3	14	64
770831	0815	1800	110	180	4.7	2.1	6.3	7	71
770921	0945	8200	760	450	6.2	2.6	7.8	12	103
771012	1350	7800	800	860	7.4	7.3	22.0	5	97
771101	1530	1200	130	1200	5.6	5.5	18.0	29	97
771128	1215	4300	15	230	6.9	7.3	24.0	20	66

Table A-1.--Continued

Station Number 11

STATION - 02421090 ALA R AB PINTOLLA CR NR PRATTVIL ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770812	0955	28.5	15.0	1.0	40	130	102	8.6	0.9	10.0
770831	0920	29.0	27.0	1.0	55	170	112	6.5	1.1	
770921	1030	21.0	30.0	0.8	100	130	158	8.2	0.4	
771013	0800	15.0	35.0	1.1	40	230	157	9.7	0.4	
771102	0922	12.5	4[illegible].0	0.9	80	130	175	11.2	0.2	56.0
771128	1230	8.0	65.0	0.8	130	90	92	11.0	0.5	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3-NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770812	0955	7.7	34.4	0.00	0.12	0.08	0.25	0.09	0.6	32
770831	0920	7.1	40.2	0.13	0.18	0.15	0.20	0.08	1.6	35
770921	1030	7.4	49.2	0.15	0.42	0.15	0.92	0.05	2.5	45
771013	0800	7.2	52.5	0.10	0.17	0.25	0.02	0.00	2.1	50
771102	0922	6.8	47.6	0.08	0.21	0.39	0.26	0.15	3.3	36
771128	1230	7.2	29.5	0.01	0.08	0.35	0.05	0.03	4.8	31

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770812	0955	8.0	2.9	5.4	5.4	6.2	930	60	67	27.0
770831	0920	8.8	3.1	6.8	6.0	8.7	390	20	90	50.0
770921	1030	11.0	5.0	8.2	8.0	5.2	570	5K	110	16.0
771013	0800	12.0	4.7	8.8	6.0	6.0	290	40	140	10.0
771102	0922	6.9	4.6	7.2	9.2	6.9	620	90	75	24.0
771128	1230	8.4	2.3	4.4	7.0	7.1	1100	160	72	24.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770812	0955	50000	68	120	8.8	17.0	58.0	11	57
770831	0920	2900	72	60	8.3	3.6	9.6	7	81
770921	1030	8000	400	280	5.5	2.4	8.5	9	87
771013	0800	7500	500	290	3.0	3.2	9.7	44	96
771102	0922	21000	360	7000B	8.4	10.0	34.0	11	96
771128	1230	6300	150	250	5.7	9.6	31.0	5	61

Station Number 12

Table A-1.--Continued

STATION - 02421195 ALA R NR BURKVILLE ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00095 [illegible] FIELD [illegible]	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770812	1100	29.0	20.0	1.0	100	140	[illegible]	9.2	1.6	10.0
770831	1030	29.0	15.0	0.9	70	160	116	6.5	0.0	
770921	1130	21.0	40.0	0.8	100	120	159	8.0	0.9	
771013	0900	15.0	20.0	1.1	80	240	168	9.4	0.7	
771102	1010	12.5	25.0	0.9	80	230	175	11.2	0.0	96.0
771128	1245	8.0	40.0	0.8	110	90	96	[illegible]	0.7	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770812	1100	7.6	31.2	0.00	0.27	0.05	0.07	0.05	0.9	26
770831	1030	6.8	39.4	0.13	0.14	0.13	0.16	0.08	14.0	35
770921	1130	7.3	46.7	0.05	0.44	0.15	0.37	0.08	2.4	47
771013	0900	6.8	50.8	0.06	0.18	[illegible]	0.07	0.06	3.2	40
771102	1010	6.9	50.8	0.01	0.21	[illegible]	0.12	0.09	6.4	47
771128	1245	6.4	24.6	0.00	[illegible]	[illegible]	0.07	0.05	4.6	32

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 [illegible]	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770812	1100	6.6	2.5	5.2	5.0	6.7	[illegible]	50	[illegible]	8.0
770831	1030	9.1	3.0	7.0	2.8	5.1	[illegible]	30	77	41.0
770921	1130	12.0	4.8	6.6	7.0	4.4	760	40	73	220.0
771013	0900	8.0	4.8	7.8	7.2	4.4	[illegible]	30	120	5.0K
771102	1010	11.0	4.6	7.6	10.0	5.4	[illegible]	40	76	38.0
771128	1245	8.8	2.4	4.4	6.2	5.7	[illegible]	[illegible]	76	44.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RESIDUE SUSP AT 105 C MG/L	70300 RESIDUE DIS-180 C MG/L
770812	1100	23000	76	78	7.3	1.8	6.5	16	63
770831	1030	650	21	44	4.5	1.5	3.7	14	81
770921	1130	7200	230	320	4.2	2.4	9.4	0	88
771013	0900	9600	[illegible]	[illegible]	[illegible]	[illegible]	10.0	5	100
771102	1010	8700	[illegible]	2900	7.4	9.0	31.0	14	107
771128	1245	3800	110	170	4.8	6.4	22.0	6	61

Table A-1.--Continued

Station Number 13

STATION - 02421220 ALA R BELOW ROCKY BR NR LOWNDSBO ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770812	1430	29.0	20.0	0.9	120	220	95	9.3	2.4	11.0
770831	1350	29.0	30.0	0.9	50	190	112	6.7	1.5	
770921	1245	21.0	40.0	0.8	130	130	156	7.6	0.8	
771013	1000	15.0	25.0	1.0	50	200	173	9.6	0.6	
771102	1118	12.5	25.0	1.0	80	250	172	11.7	0.0	90.0
771128	1320	8.0	40.0	0.8	120	100	96	10.2	0.5	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770812	1430	6.3	29.5	0.00	0.21	0.13	0.08	0.04	0.6	29
770831	1350	6.7	36.9	0.13	0.30	0.01	0.15	0.06	1.8	35
770921	1245	7.3	44.3	0.34	0.76	0.17	0.54	0.02	2.7	46
771013	1000	7.5	52.5	0.02	0.09	0.23	0.12	0.01	1.9	33
771102	1118	6.5	50.8	0.00	0.23	0.31	0.12	0.09	3.6	40
771128	1320	6.1	20.5	0.00	0.03	0.27	0.17	0.05	19.0	32

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770812	1430	7.4	2.5	4.6	4.6	6.6	460	70	58	19.0
770831	1350	8.9	3.1	6.6	5.2	11.0	400	300	66	22.0
770921	1245	12.0	4.6	7.0	6.0	4.8	480	70	77	11.0
771013	1000	5.4	4.6	7.6	9.0	5.1	280	20	110	13.0
771102	1118	8.4	4.6	7.6	10.0	4.3	840	110	62	25.0
771128	1320	8.8	2.3	4.8	5.4	6.4	1200	160	110	29.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770812	1430	0B	0L	400	10.0	4.8	14.0	10	56
770831	1350	3200	0	26	4.8	2.7	7.7	10	73
770921	1245	7000	1100	320	4.6	4.3	14.0	23	76
771013	1000	9600	960	160	5.8	5.8	19.0	26	103
771102	1118	10000	300	3100	6.0	7.6	26.0	14	95
771128	1320	5800	100	150	3.4	4.7	21.0	11	61

Table A-1.--Continued

Station Number 14

STATION - 02421290   ALA R BELOW BEAVER CR NR AUTAUGA   ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770816	0745	29.0	20.0	0.9	60	160	82	7.4	0.0	11.0
770901	0930	29.0	21.0	0.9	80	210	99	8.2	1.8	
770922	1010	20.0	30.0	0.8	110	120	155	7.2	0.5	
771013	1200	16.0	30.0	0.8	65	240	179	9.2	0.6	
771103	1015	12.0	30.0	0.8	125	240	176	12.6	1.4	60.0
771129	0900	8.0	30.0	0.8	110	150	106	11.1	1.4	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770816	0745	6.4	31.2	1.60	0.41	0.07	0.12	0.02	0.8	24
770901	0930	6.8	29.5	0.10	0.19	0.19	0.16	0.00	1.7	30
770922	1010	7.0	46.7	0.03	0.43	0.16	0.39	0.01	3.8	44
771013	1200	7.4	52.5	0.25	[illegible]	0.22	0.09	0.03	1.5	48
771103	1015	7.4	51.7	0.00	[illegible]	0.38	0.10	0.09	3.4	38
771129	0900	7.3	30.3	0.01	[illegible]	0.26	0.14	0.05	4.6	29

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE [illegible] UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770816	0745	6.1	2.2	5.4	5.0	[illegible]	[illegible]	120	62	0.00
770901	0930	7.6	2.6	6.2	4.8	[illegible]	[illegible]	50	83	10.0
770922	1010	11.0	4.6	7.4	[illegible]	[illegible]	[illegible]	5K	79	22.0
771013	1200	11.0	5.0	8.0	[illegible]	[illegible]	[illegible]	40	320	16.0
771103	1015	7.9	4.4	6.0	10.0	[illegible]	[illegible]	[illegible]	110	22.0
771129	0900	8.1	2.2	4.8	7.0	[illegible]	[illegible]	[illegible]	100	20.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RESIDUE [illegible] MG/L	70300 RESIDUE DISS-180 C MG/L
770816	0745	5800	0	87	[illegible]	[illegible]	[illegible]	9	51
770901	[illegible]	6800	0	28	[illegible]	[illegible]	[illegible]	12	70
770922	[illegible]	1000	410	80	[illegible]	[illegible]	[illegible]	33	80
771013	[illegible]	160	0	990	[illegible]	[illegible]	[illegible]	9	103
771103	[illegible]	600	16	67	[illegible]	[illegible]	[illegible]	0	102
771129	0900	2500	98	87	[illegible]	5.4	[illegible]	16	71

Table A-1.--Continued

Station Number 15

STATION - 02421315 ALA R BELOW IVY CR NR MULBERRY ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770816	0930	29.0	35.0	0.7	40	140	90	7.0	1.2	9.0
770901	1045	29.0	28.0	0.6	80	220	96	8.0	1.3	
770922	1050	21.0	30.0	0.8	120	120	155	7.0	0.2	
771013	1300	16.0	42.0	0.8	100	230	178	9.1	0.5	
771103	1050	12.0	[illegible]	1.0	85	220	171	12.8	1.2	52.0
771129	0925	8.0	[illegible]	0.8	120	150	105	11.0	1.4	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770816	0930	7.2	37.7	1.60	0.32	0.12	0.09	0.01	1.6	28
770901	1045	6.8	34.4	0.09	0.25	0.07	0.13	0.02	3.2	31
770922	1050	7.1	46.7	0.01K	0.56	0.17	0.57	0.02	2.0	46
771013	1300	7.4	50.8	0.01	0.17	0.22	0.11	0.09	8.5	37
771103	1050	7.5	50.8	0.01	0.17	0.40	0.13	0.12	3.4	39
771129	0925	7.4	30.3	0.01	0.06	0.28	0.17	0.05	7.5	31

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770816	0930	7.0	2.4	5.0	3.8	7.4	670	60	62	8.0
770901	1045	8.2	2.6	5.6	5.2	11.0	690	60	78	14.0
770922	1050	12.0	4.6	7.6	5.2	4.5	750	30	78	28.0
771013	1300	7.1	4.8	8.6	7.0	5.3	490	20	180	5.0K
771103	1050	8.2	4.4	6.4	10.0	6.6	1900	150	90	58.0
771129	0925	8.7	2.3	4.8	7.0	8.0	1000	130	75	11.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770816	0930	70000	0	28	21.0	14.0	36.0	5	55
770901	1045	3700	6	10	5.0	4.9	14.0	1	69
770922	1050	2000	140	160	4.4	2.2	6.4	26	71
771013	1300	9200	370	170	12.0	18.0	62.0	33	110
771103	1050	2000	40	92	3.9	3.0	14.0	26	96
771129	0925	1600	82	66	4.5	5.0	27.0	5	60

Table A-1.--Continued

Station Number 16

STATION - 02421325 ALA R AT DAYS BEND NR BENTON ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770816	1100	30.0	15.0	0.8	90	130	90	7.2	1.1	9.0
770901	1135	30.0	45.0	0.9	85	200	102	8.4	1.4	
770922	1145	21.0	20.0	0.7	110	120	156	7.0	0.8	
771013	1400	16.0	35.0	0.9	98	240	177	9.0	0.5	
771103	1100	12.0	20.0	1.0	70	130	173	12.8	1.1	46.0
771129	0920	8.0	35.0	0.8	110	150	98	11.0	0.4	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770816	1100	7.1	42.6	0.07	0.12	0.09	0.08	0.02	0.6	29
770901	1135	6.9	64.8	0.11	0.23	0.15	0.14	0.01	6.0	31
770922	1145	7.2	47.6	0.06	0.91	0.16	0.29	0.02	3.3	46
771013	1400	7.4	53.3	0.14	0.24	0.10	0.05	0.04	2.1	59
771103	1100	7.2	47.6	0.00	0.19	0.39	0.19	0.12	3.4	37
771129	0920	7.4	30.3	0.01	0.07	0.27	0.18	0.05	4.5	32

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770816	1100	7.2	2.5	5.0	4.2	[illegible]	[illegible]	.20	54	0.0U
770901	1135	7.9	2.7	6.2	5.6	[illegible]	[illegible]	50	64	0.0U
770922	1145	12.0	4.6	7.8	5.8	4.7	[illegible]	50	58	5.0K
771013	1400	15.0	5.2	6.2	9.0	4.9	5K	10	5K	5.0K
771103	1100	7.1	4.6	8.0	10.4	3.0	[illegible]	.30	[illegible]	9.0
771129	0920	8.9	2.4	4.0	7.4	7.2	[illegible]	[illegible]	27	12.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 [illegible]	70300 RESIDUE DISS-180 C MG/L
770816	1100	77000	0	12	26.0	[illegible]	[illegible]	5	56
770901	1135	1800	0	24	5.6	3.6	[illegible]	20	67
770922	1145	3000	60	60	4.5	3.2	[illegible]	15	71
771013	1400	5000	130	130	2.0	[illegible]	5.6	45	107
771103	1100	4200	34	160	5.0	6.2	22.0	39	116
771129	0920	3000	85	170	4.5	5.5	19.0	16	66

Table A-1.--Continued

Station Number 17

STATION - 02421349 ALA R JONES BLUFF NR BENTON ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770816	[illegible]	30.0	25.0	0.[illegible]	30	130	93	7.7	1.8	11.0
[illegible]	1340	29.0	11.0	0.9	70	200	101	8.0	1.9	
[illegible]21	1645	21.0	20.0	0.8	120	120	160	7.1	1.1	
771014	0800	15.0	[illegible]	1.0	34	210	176	10.8	0.0	
771103	1340	[illegible]	[illegible]	0.9	70	180	169	12.8	0.9	[illegible]
[illegible]	[illegible]	8.0	[illegible]	0.8	110	150	99	11.2	0.3	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770816	1435	7.0	29.5	0.04	0.39	0.09	0.07	0.02	1.6	29
770901	1340	7.1	32.3	0.08	0.24	0.17	0.20	0.02	3.7	31
770921	1645	7.3	46.7	0.01	0.42	0.15	0.40	0.06	0.3	43
771014	0800	7.1	59.9	0.02	0.28	0.23	0.11	0.09	1.8	44
771103	1340	7.6	50.8	0.03	0.04	0.39	0.09	0.04	3.6	47
771129	0950	7.5	31.2	0.00	0.09	0.28	0.16	0.04	4.6	34

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770816	1435	7.4	2.5	5.4	4.6	7.3	810	130	59	1.0
770901	1340	7.9	2.7	6.4	5.2	5.9	580	20	63	2.0
770921	1645	11.0	4.5	7.8	6.2	4.2	420	30	55	5.0K
771014	0800	9.2	5.0	7.6	7.0	7.0	160	20	66	5.0K
771103	1340	11.0	4.6	6.4	10.4	6.3	660	120	600	9.0
771129	0950	9.3	2.5	4.4	7.4	7.0	1100	210	70	17.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770816	1435	[illegible]	0	12	7.3	7.3	23.0	12	59
770901	1340	[illegible]	12	8	7.7	6.6	19.0	9	68
770921	1645	[illegible]	0	50	4.8	2.7	7.7	19	61
771014	[illegible]	[illegible]	460	110	4.4	[illegible]	14.0	22	99
771103	1340	[illegible]	[illegible]	110	12.0	18.0	63.0	11	123
771129	[illegible]	[illegible]	72	68	2.9	2.2	8.5	30	67

Table A-1.--Continued

Station Number 18

STATION - 02421355 ALA RIVER NR BENTON ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770816	1635	30.0	10.0	0.8	60	200	93	6.8	0.7	13.0
770901	1450	29.0	25.0	0.7	70	200	101	9.2	1.4	
770922	1445	21.0	40.0	0.6	100	110	160	6.7	0.7	
771014	0900	15.0	20.0	1.0	100	220	160	10.8	0.0	
771103	1500	13.0	25.0	0.8	70	140	172	13.0	0.3	70.0
771129	1115	9.0	50.0	0.8	110	100	101	11.4	0.0	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770816	1635	7.4	28.7	0.07	0.16	0.12	0.11	0.02	1.4	29
770901	1450	6.9	38.5	0.11	0.10	0.18	0.22	0.05	2.2	31
770922	1445	7.2	47.6	0.01	0.44	0.15	0.25	0.03	2.0	48
771014	0900	7.4	54.1	0.96	0.09	0.23	0.03	0.02	1.7	36
771103	1500	7.5	49.2	0.00	0.18	0.34	0.13	0.09	2.8	38
771129	1115	7.3	30.3	0.01	0.07	0.28	0.19	0.05	8.2	34

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	0094[illegible] SULFATE SO4-DISS MG/L	00[illegible] SILICA DISOLVED MG/L	[illegible]045 IRON FE-TOT UG/L	[illegible]046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770816	1635	7.2	2.5	5.0	3.4	[illegible]	[illegible]	[illegible]20 (partly legible)	67	42.0
770901	1450	8.0	2.7	6.0	5.2	6.2	[illegible]	70	76	4.0
770922	1445	13.0	4.6	7.4	8.8	4.5	[illegible]	[illegible]	87	5.0K
771014	0900	6.5	4.8	7.8	5.0	5.[illegible] (partly legible)	[illegible]	0	83	5.0K
771103	1500	7.7	4.5	6.8	10.0	1.9	[illegible]	[illegible]0 (partly legible)	130	7.0
771129	1115	9.4	2.5	4.0	6.2	7.5	[illegible]	[illegible]	74	17.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	3221[illegible] CHLRPHYL [illegible]	[illegible]59 [illegible]	70300 RESIDUE DISS-180 C MG/L
770816	1635	45000	140	130	15.0	[illegible].2 (partly legible)	24.0	12	57
770901	1450	17000	4	38	5.3	4.0	[illegible]	14	65
770922	1445	2000	42	40	4.6	[illegible].8 (partly legible)	7.3	19	84
771014	0900	14000	120	94	7.[illegible] (partly legible)	[illegible]	31[illegible] (partly legible)	15	108
771103	1500	3400	24	120	7.3	9.6	34.0	3	100
771129	1115	2500	65	110	2.8	2.5	6.2	28	65

Table A-1.--Continued

Station Number 19

STATION - 02422170 ALA R VR STATESVILLE ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770816	1800	30.0	15.0	0.8	35	220	99	7.5	1.3	13.0
770906	0820	28.0	30.0	0.8	90	230	98	7.5	0.3	
770926	1120	21.0	40.0	0.8	70	160	170	8.5	0.0	
771017	1330	14.0	15.0	0.9	20	210	172	10.6	0.4	
771107	1255	12.0	50.0	0.6	160	210	154	11.2	1.2	160.0
771130	1130	9.0	20.0	0.7	150	160	94	12.4	0.0	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770816	1800	6.8	31.2	0.00	0.14	0.12	0.14	0.03	1.5	29
770906	0820	7.0	32.0	0.06	0.25	0.25	0.22	0.03	1.3	31
770925	1120	7.1	47.6	0.09	0.57	0.28	0.61	0.05	2.7	49
771017	1330	5.5	37.7	0.05	0.18	0.29	0.11	0.06	1.9	49
771107	1255	7.5	45.9	0.00	0.05	0.34	0.15	0.05	4.0	40
771130	1130	7.2	30.3	0.00	0.15	0.28	0.17	0.04	5.0	33

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770816	1800	7.5	2.5	4.4	1.4	7.4	650	100	64	0.0U
770906	0820	8.1	2.6	6.2	4.8	6.0	850	10	71	0.0U
770926	1120	13.0	4.8	0.1	8.2	4.9	520	10	67	5.0
771017	1330	12.0	4.6	7.2	6.0	6.4	340	90	95	5.0K
771107	1255	9.8	3.7	6.0	8.0	6.7	2000	230	180	14.0
771130	1130	9.0	2.4	4.0	8.2	8.2	1300	190	85	12.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770816	1800	210000	70	44	8.4	2.6	6.1	13	61
770906	0820	3700	1500	1600	6.2	2.6	6.7	22	65
770926	1120	2000	4	30	5.7	5.0	15.0	12	66
771017	1330	[illegible]	65	14	3.0	1.0	2.1	15	100
771107	1255	3400	64	310	6.9	7.8	24.0	6	97
771130	1130	3900	53	230	2.7	2.1	5.7	36	62

Table A-1.--Continued

Station Number 20

STATION - 02422625 ALA R BELOW MULBERY CR NR BURNSV ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770817	0915	29.0	15.0	1.2	10	140	96	8.1	1.6	15.0
770906	0935	28.0	35.0	0.7	100	130	100	7.0	0.3	
770926	1120	20.5	30.0	0.9	80	130	152	9.0	0.0	
771017	1420	14.0	20.0	0.8	40	200	171	10.6	0.3	
771107	1345	12.0	60.0	0.5	130	210	149	11.0	1.4	156.0
771130	1150	9.0	65.0	0.7	140	160	94	12.6	0.0	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770817	0915	7.6	31.2	1.40	0.17	0.12	0.13	0.02	1.5	29
770906	0935	7.0	31.2	0.14	0.20	0.26	0.23	0.04	1.4	31
770926	1120	7.3	41.8	0.01	0.21	0.22	0.45	0.02	2.7	33
771017	1420	6.9	52.5	0.01K	0.38	0.27	0.08	0.06	2.3	51
771107	1345	7.6	44.3	0.01	0.00	0.36	0.18	0.17	3.6	40
771130	1150	6.8	27.1	0.00	0.12	0.38	0.17	0.04	3.4	33

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770817	0915	7.6	2.4	6.0	5.0	[illegible]	[illegible]	10	47	18.0
770906	0935	8.1	2.5	7.2	5.4	7.5	[illegible]	5K	57	18.0
770926	1120	7.0	4.3	8.8	9.0	5.4	[illegible]	5K	91	27.0
771017	1420	13.0	4.4	7.0	7.0	6.7	[illegible]	20	98	5.0K
771107	1345	10.0	3.6	5.6	9.0	7.9	[illegible]	140	200	[illegible]
771130	1150	9.2	2.4	6.4	4.0	6.7	[illegible]	[illegible]	84	20.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	[illegible]	70300 RESIDUE DIS-180 C MG/L
770817	0915	37000	0	26	8.5	[illegible]	2.7	7	56
770906	0935	2700	190	960	11.0	3.4	9.9	17	[illegible]
770926	1120	10000	150	34	6.7	5.6	17.0	13	55
771017	1420	3200	81	62	4.6	2.7	8.9	24	97
771107	1345	6800	310	110	5.7	4.5	16.0	37	106
771130	1150	1500	59	160	3.2	2.8	8.8	10	59

Table A-1.--Continued

Station Number 21

STATION - 02422650 ALA R NR MANILA ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBILMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770817	1030	29.5	15.0	1.0	50	130	102	8.3	1.4	10.0
770906	1100	28.0	30.0	0.8	110	210	97	7.8	0.3	
770926	1430	21.0	40.0	0.9	115	70	161	9.0	0.0	
771017	1445	14.0	2[illegible].0	0.8	60	200	181	10.6	0.6	
771107	1500	12.0	50.0	0.5	150	210	150	11.0	1.3	118.[illegible]
771130	1220	9.0	40.0	0.7	140	120	95	12.5	0.2	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770817	1030	7.5	32.0	0.07	0.17	0.09	0.04	0.02	1.5	30
770906	1100	7.0	31.2	0.03	0.23	0.25	0.18	0.05	1.2	31
770926	1430	7.4	44.3	0.01	0.58	0.22	0.24	0.05	2.3	46
771017	1445	6.9	50.8	0.05	0.11	0.26	0.10	0.07	2.5	47
771107	1500	7.5	41.0	0.01	0.05	0.37	0.18	0.14	4.2	43
771130	1220	6.4	27.1	0.12	0.14	0.29	0.21	0.04	19.0	32

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770817	1030	7.8	2.4	6.2	6.8	6.8	500	80	61	32.0
770906	1100	8.0	2.5	5.8	4.6	8.5	590	20	46	0.0U
770926	1430	12.0	4.6	7.0	8.0	5.5	1100	10	89	23.0
771017	1445	11.0	4.6	9.2	6.0	7.6	370	40	220	39.0
771107	1500	11.0	3.7	6.0	8.0	5.0	2200	130	170	15.0
771130	1220	8.8	2.4	4.0	7.0	6.9	1400	180	83	25.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770817	1030	99000	130	36	6.8	0.9	0.4	10	58
770906	1100	780	110	350	7.5	2.7	9.8	13	66
770926	1430	7000	560	190	6.7	4.0	13.0	21	83
771017	1445	4300	150	59	5.8	3.7	15.0	11	111
771107	1500	3700	140	620	7.7	3.9	25.0	11	76
771130	1220	1900	170	270	2.4	2.4	7.6	5	61

Table A-1.--Continued

Station Number. 22

STATION - 02422765 ALA R NR CRAIG AFB NR SELMA ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770817	1320	30.0	10.0	1.0	40	160	102	9.1	1.8	12.0
770906	1235	28.0	15.0	0.9	50	150	92	8.2	0.0	
770926	1520	21.0	25.0	0.8	100	70	165	8.9	0.0	
771017	1450	14.0	50.0	0.8	60	200	185	10.4	0.7	
771107	1545	12.0	60.0	0.5	170	220	152	10.8	0.9	90.0
771130	1230	9.0	70.0	0.7	145	120	95	12.2	0.0	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770817	1320	7.4	33.6	0.07	0.15	0.02	0.11	0.03	1.8	28
770906	1235	7.1	29.5	0.05	0.23	0.21	0.25	0.02	1.4	29
770926	1520	7.5	47.6	0.16	0.64	0.23	0.70	0.04	1.7	47
771017	1450	6.8	51.7	0.01	0.17	0.25	0.12	0.08	1.6	49
771107	1545	7.5	46.7	0.01	0.16	0.35	0.15	0.14	3.6	35
771130	1230	6.4	25.4	0.00	0.04	0.28	0.18	0.03	4.5	31

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770817	1320	7.5	2.3	7.6	5.2	7.2	520	50	6[illegible]	33.0
770906	1235	7.5	2.4	6.0	4.2	6.5	600	40	50	0.00
770926	1520	12.0	4.7	8.0	9.0	5.2	950	30	110	20.0
771017	1450	12.0	4.6	9.0	7.0	6.2	590	50	130	61.0
771107	1545	8.0	3.7	6.8	8.0	7.2	1500	170	180	12.0
771130	1230	8.6	2.3	6.0	6.4	6.3	1600	270	83	41.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770817	1320	41000	0	24	4.6	0.0	0.0	9	61
770906	1235	170	100	200	10.0	4.0	11.0	8	59
770926	1520	5000	180	120	5.9	3.5	7.4	22	56
771017	1450	3700	430	34	5.3	4.1	12.0	48	124
771107	1545	7600	180	560	5.2	3.4	12.0	5	80
771130	1230	8000	72	340	3.4	3.4	11.0	16	61

Table A-1.--Continued

Station Number 23 STATION - 02423000 ALA R AT SELMA ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770817	1625	31.0	22.0	1.0	20	240	107	9.6	2.0	24.0
770906	1455	28.0	30.0	0.9	90	200	104	7.4	0.0	
770926	1640	20.0	30.0	0.8	120	50	169	8.2	0.0	
771017	1525	14.0	15.0	0.9	40	200	176	10.6	0.1	
771108	0930	12.0	50.0	0.5	180	200	145	11.7	0.5	238.0
771130	1310	9.0	30.0	0.7	120	150	95	12.5	0.0	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770817	1625	7.8	26.7	0.00	0.14	0.07	0.11	0.02	1.5	28
770906	1455	7.1	31.2	0.03	0.25	0.26	0.25	0.03	2.3	30
770926	1640	7.4	45.1	0.01	0.46	0.29	0.42	0.02	2.2	46
771017	1525	7.1	50.0	0.03	0.24	0.23	0.00	0.00	2.3	52
771108	0930	7.4	42.6	0.04	0.07	0.33	0.15	0.15	3.5	39
771130	1310	6.3	23.8	0.00	0.13	0.29	0.21	0.05	3.6	30

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770817	1625	7.3	2.3	7.0	4.8	7.2	600	30	66	8.0
770906	1455	7.8	2.5	8.0	4.8	6.6	610	70	60	60.0
770926	1640	12.0	4.6	9.8	8.4	5.2	1100	10	140	54.0
771017	1525	13.0	4.6	7.4	6.0	6.2	340	30	120	13.0
771108	0930	9.9	3.4	11.2	8.0	6.5	2800	190	180	32.0
771130	1310	8.5	2.2	4.8	2.0	7.0	1900	190	79	26.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770817	1625	210000	530	30	16.0	2.9	2.7	7	67
770906	1455	11000	0	1300	12.0	8.4	26.0	8	74
770926	1640	20000	1200	730	10.0	5.2	1.5	21	90
771017	1525	3000	99	92	7.3	8.2	26.0	45	102
771108	0930	4600	150	530	4.2	2.2	7.5	68	81
771130	1310	3400	120	600	[illegible]	4.1	14.0	27	58

Station Number 24

Table A-1.--Continued

STATION - 02423050 ALA R NR SELMA ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770818	0810	29.0	25.0	0.9	90	190	98	5.8	0.9	19.0
770907	0950	28.0	20.0	0.8	130	120	102	7.1	2.4	
770927	1005	20.0	30.0	0.9	100	140	162	7.2	0.4	
771018	0915	13.0	20.0	1.0	80	220	179	10.4	0.4	
771108	1020	12.0	50.0	0.5	170	220	148	11.6	0.6	236.0
771201	1010	8.0	40.0	0.7	135	150	93	13.8	0.0	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770818	0810	7.0	25.4	0.00	0.30	0.12	0.12	0.02	1.2	28
770907	0950	6.8	31.2	0.25	0.18	0.16	0.23	0.03	2.1	30
770927	1005	7.4	45.9	0.18	0.54	0.23	0.57	0.02	1.9	49
771018	0915	7.1	52.5	0.03	0.08	0.27	0.19	0.00	2.1	39
771108	1020	7.1	37.7	0.02	0.02	0.34	0.18	0.15	3.9	32
771201	1010	7.2	28.7	0.00	0.00	0.28	0.23	0.05	4.7	32

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770818	0810	7.2	2.3	7.4	4.4	7.8	550	90	85	16.0
770907	0950	7.9	2.5	8.3	0.6	6.0	770	50	73	6.0
770927	1005	12.0	4.6	10.0	8.0	5.6	440	64	63	14.0
771018	0915	8.0	4.5	9.6	9.0	6.2	400	30	100	430.0
771108	1020	7.2	3.4	6.0	7.2	6.1	[illegible]	490	190	10.0
771201	1010	6.8	2.3	5.2	8.0	6.8	1500	160	930	22.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 MG/L
770818	0810	1600	130	220	8.7	2.1	1.2	14	68
770907	0950	17000	350	420	7.2	[illegible]	15.0	6	74
770927	1005	7000	860	850	7.8	3.7	10.0	7	56
771018	0915	4900	510	69	3.1	[illegible]	0.0	16	107
771108	1020	3900	240	530	2.0	[illegible]	0.0	16	111
771201	1010	5500	130	290	4.4	5.6	18.0	33	60

Station Number 25

Table A-1.--Continued

STATION - 02423090 ALA R AB CAHABA R NR CAHABA ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	[illegible] COD LOW LEVEL MG/L
770818	0950	29.0	10.0	0.8	60	130	117	5.8	[illegible]	[illegible]
770907	1105	28.0	30.0	0.8	90	120	106	6.7	1.7	
770927	1120	20.0	40.0	0.8	130	120	165	[illegible]	[illegible]	
771018	1010	13.0	10.0	0.9	50	230	175	10.2	[illegible]	
771108	1155	12.0	50.0	0.5	130	220	151	11.5	[illegible]	[illegible]
771201	1022	8.0	40.0	0.7	140	160	93	13.8	[illegible]	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C MG/L	00900 TOT HARD CACO3 MG/L
770818	0950	7.2	44.3	0.03	0.16	0.09	0.16	0.03	1.0	47
770907	1105	7.0	32.8	0.19	0.14	0.15	0.37	0.37	2.2	32
770927	1120	7.4	45.1	0.01K	0.25	0.24	0.67	0.03	2.1	49
771018	1010	7.2	52.5	1.00K	0.36	0.25	0.10	0.06	2.2	34
771108	1155	7.0	41.0	0.07	0.00	0.30	0.12	0.03	4.4	45
771201	1022	7.4	29.5	0.00	0.24	0.28	0.18	0.05	4.5	32

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770818	0950	13.0	3.4	5.2	6.0	7.6	750	70	72	0.0U
770907	1105	8.7	2.6	8.7	1.4	5.7	850	5K	64	4.0
770927	1120	12.0	4.5	9.2	7.6	4.4	15000	105	130	18.0
771018	1010	6.4	4.4	8.4	7.2	5.8	530	50	87	7.0
771108	1155	12.0	3.6	6.0	9.0	7.6	2000	10	190	9.0
771201	1022	8.8	2.3	0.4	7.0	6.8	1400	220	84	12.0

DATE	TIME	31501 TOT COLI IMMEDIATE MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770818	0950	80000	270	40	13.0	5.0	13.0	13	73
770907	1105	8000	40	250	8.1	7.6	8.7	13	78
770927	1120	3600	90	363	7.8	3.7	11.0	7	79
771018	1010	2400	10	51	5.8	3.6	11.0	20	103
771108	1155	2800	260	510	4.5	3.3	12.0	10	85
771201	1022	2700	400	180	2.2	2.3	4.8	15	33

Table A-1.--Continued

Station Number 26

STATION - 02425115 ALA R NR CAHABA ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770818	1107	30.0	20.0	0.9	60	180	118	7.7	2.4	12.0
770907	1350	28.0	30.0	0.7	100	110	112	7.0	1.2	
770927	1205	20.0	35.0	0.8	120	110	167	6.2	0.7	
771018	1100	13.0	50.0	0.8	40	230	176	1.0	0.7	
771108	1315	12.0	60.0	0.5	190	220	154	11.4	0.2	184.0
771201	1010	8.0	50.0	0.6	135	170	97	13.8	0.1	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770818	1107	7.2	41.8	0.07	0.21	0.13	0.11	0.03	0.9	35
770907	1350	7.3	33.6	0.21	0.64	0.16	0.26	0.07	1.9	34
770927	1205	7.4	48.4	0.39	0.77	0.27	0.52	0.06	2.2	52
771018	1100	6.9	60.7	1.00K	0.12	0.28	0.09	0.03	2.2	36
771108	1315	7.0	38.5	0.04	0.03	0.27	0.09	0.06	3.0	32
771201	1010	7.3	31.2	0.20	0.05	0.27	0.20	0.09	3.9	34

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770818	1107	9.2	2.8	8.0	5.4	7.0	[illegible]30	80	57	[illegible].00
770907	1350	9.1	2.8	7.7	4.6	6.1	[illegible]0	40	83	0.00
770927	1205	13.0	4.6	9.2	8.0	6.6	[illegible]0	35	60	9.0
771018	1100	7.3	4.4	8.0	7.0	7.4	550	20	96	230.0
771108	1315	6.8	3.5	6.0	9.4	6.0	[illegible]00	[illegible]40	160	40.0
771201	1010	9.4	2.4	4.0	8.0	5.9	[illegible]	[illegible]0	68	7.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 110 C MG/L	70300 RESIDUE DISS-180 C MG/L
770818	1107	170000	20	32	12.0	5.9	20.0	2	74
770907	1350	1800	26	76	7.8	3.7	[illegible].5	14	80
770927	1205	3000	40	280	10.0	4.7	13.0	6	77
771018	1100	1400	93	35	5.8	4.0	12.0	21	139
771108	1315	3900	190	160	7.2	1.2	4.9	23	65
771201	1010	1700	130	150	2.1	1.2	4.7	27	27

Stati... ...mber 2?

Table A-1.--Continued

STATION - 02425250 ALA R AB CEDAR CR NR BELKNAP ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770818	1230	30.0	30.0	0.7	50	120	116	5.2	0.6	12.0
770907	1530	28.0	30.0	0.7	95	150	110	6.8	1.1	
770927	1415	21.0	40.0	0.8	140	80	171	6.5	0.2	
771018	1300	14.0	10.0	0.8	60	230	180	10.2	1.2	
771109	1035	12.0	60.0	0.6	150	220	147	11.7	1.2	170.0
771201	1146	8.0	40.0	0.6	140	180	98	13.6	0.8	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770818	1230	7.0	36.1	0.07	0.29	0.11	0.26	0.02	0.8	39
770907	1530	7.1	31.2	0.16	0.17	0.20	0.14	0.05	3.4	31
770927	1415	7.5	0.0	0.01K	0.47	0.24	0.13	0.06	3.7	52
771018	1300	7.0	52.5	0.03	0.36	0.28	0.11	0.09	1.3	33
771109	1035	7.2	39.4	0.04	0.01	0.33	0.15	0.07	3.5	28
771201	1146	7.4	31.2	0.00	0.15	0.29	0.18	0.12	5.6	35

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770818	1230	11.0	2.7	6.6	5.0	7.2	930	10	52	3.0
770907	1530	8.2	2.5	8.8	4.6	5.5	840	0	60	4.0
770927	1415	13.0	4.6	9.0	0.1	5.3	480	10	74	10.0
771018	1300	5.9	4.5	7.6	6.0	6.3	700	60	88	25.0
771109	1035	5.6	3.3	2.0	10.2	4.1	2700	470	200	11.0
771201	1146	9.7	2.6	4.0	8.0	7.3	880	220	90	14.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770818	1230	150000	14	24	8.5	3.8	10.0	17	78
770907	1530	2700	0	68	9.6	3.9	9.4	7	92
770927	1415	1000	12	90	13.0	6.0	18.0	8	7
771018	1300	1000	44	34	6.2	4.1	13.0	10	96
771109	1035	4300	140	210	4.1	3.2	9.9	5	65
771201	1146	3900	200	340	7.6	25.0	84.0	15	45

Station Number 23

Table A-1.--Continued

STATION - 02425700 ALA R NR ELM BLUFF ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770819	1100	29.5	30.0	0.6	50	190	128	6.6	0.7	10.0
770907	1645	28.5	30.0	0.7	95	150	108	6.7	1.8	
770927	1505	21.0	30.0	0.7	100	80	169	7.0	0.0	
771018	1400	13.0	45.0	0.8	50	230	181	10.0	1.1	
771109	1110	12.0	40.0	0.5	150	210	146	11.5	1.4	106.0
771201	1208	8.0	35.0	0.6	130	180	99	13.6	0.2	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770819	1100	7.9	50.8	0.11	0.20	0.18	0.17	0.03	0.7	40
770907	1645	7.1	31.2	0.24	0.24	0.17	0.27	0.05	2.0	33
770927	1505	7.4	48.4	0.01	0.52	0.23	0.12	0.03	3.0	52
771018	1400	7.1	50.8	0.01	0.13	0.26	0.08	0.04	1.6	40
771109	1110	7.2	40.2	0.00	[illegible]	0.53	0.19	0.10	4.1	38
771201	1208	7.5	32.0	0.05	0.08	0.28	0.14	0.08	6.4	36

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770819	1100	11.0	2.9	6.0	5.6	7.0	470	60	53	9.0
770907	1645	8.8	2.5	7.9	6.2	6.4	[illegible]	10	[illegible]	0.00
770927	1505	13.0	4.6	8.8	8.8	5.1	[illegible]	450	20	50.0
771018	1400	8.2	4.6	8.8	5.0	4.6	[illegible]	20	110	[illegible]
771109	1110	10.0	3.2	7.6	9.0	6.4	[illegible]	[illegible]	200	[illegible]
771201	1208	10.0	2.6	4.0	9.2	7.6	[illegible]	[illegible]	82	[illegible]

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770819	1100	91000	0	44	5.6	1.8	4.7	22	65
770907	1645	2000	0	95	16.0	5.8	17.0	22	88
770927	1505	2000	30	730	10.0	3.6	[illegible]	8	78
771018	1400	1200	40	43	4.9	[illegible]	[illegible]	4	155
771109	1110	2800	320	240	4.9	5.8	19.0	6	96
771201	1208	4100	140	210	5.2	5.0	17.0	16	33

Table A-1.--Continued

Station Number 29

STATION - 02425800 ALA R AB BOGUECHITTO CREEK ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOW-LEVEL MG/L
770819	1100	29.0	35.0	0.6	80	130	119	6.2	0.9	[illegible]
770907	1750	29.0	30.0	0.7	110	160	104	6.8	2.2	
770927	1620	21.0	40.0	0.8	90	80	175	7.0	[illegible]	
771018	1500	14.0	15.0	0.7	60	230	191	10.2	1.8	
771109	1235	12.0	55.0	0.5	170	210	142	11.3	0.8	[illegible]
771201	1300	8.0	40.0	0.7	120	170	99	13.0	[illegible]	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770819	1100	7.4	40.2	0.10	0.22	0.38	0.17	0.04	1.1	42
770907	1750	7.1	29.5	0.13	0.18	0.23	0.24	0.04	1.5	30
770927	1620	7.5	47.6	0.01K	0.41	0.25	0.06	0.01	2.3	51
771018	1500	7.2	52.5	0.01	0.09	0.28	0.06	0.03	1.4	39
771109	1235	7.3	40.2	0.00	0.57	0.34	0.18	0.08	3.6	41
771201	1300	7.6	32.9	0.00	0.12	0.29	0.16	0.04	4.2	35

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770819	1100	12.0	2.9	6.4	6.0	7.0	810	100	54	0.00
770907	1750	8.2	2.3	7.5	4.4	5.8	630	70	55	0.00
770927	1620	13.0	4.4	9.4	9.2	5.3	8500	[illegible]00	76	5.0K
771018	1500	7.6	4.8	7.6	5.0	5.3	490	20	100	9.0
771109	1235	11.0	3.2	5.2	10.0	6.5	2500	550	130	5.0K
771201	1300	9.8	2.5	4.0	8.0	7.4	1400	190	82	14.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31615 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770819	1100	[illegible]	0	24	14.0	3.6	7.6	18	76
770907	1750	2500	2	64	13.0	6.3	18.0	8	85
770927	1620	600	0	50	10.0	3.2	10.0	9	70
771018	1500	930	[illegible]	15	[illegible]	6.0	18.0	21	140
771109	1235	4600	[illegible]	240	4.7	5.5	18.0	22	67
771201	1300	1600	[illegible]	200	4.6	4.6	15.0	16	42

Table A-1.--Continued

Station Number 30

STATION - 02427400 ALA R NR CAMDEN ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770819	1500	30.0	20.0	0.8	40	160	130	6.9	1.4	10.0
770908	0805	28.5	40.0	0.8	120	180	120	6.3	0.7	
770928	1200	21.0	40.0	0.6	110	170	165	8.3	2.7	
771019	1045	14.0	40.0	0.7	70	250	186	8.8	0.5	
771110	0740	11.0	70.0	0.5	170	200	136	12.0	0.8	120.0
771206	1300	8.0	60.0	0.6	160	220	120	11.6	0.1	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770819	1500	7.3	39.4	0.00	0.19	0.19	0.33	0.02	1.5	42
770908	0805	7.0	41.0	0.15	0.36	0.20	0.27	0.05	4.5	39
770928	1200	6.5	45.9	0.66	0.60	0.15	0.10	0.06	2.1	50
771019	1045	7.1	50.0	0.26	0.25	0.25	0.06	0.05	1.6	42
771110	0740	6.9	39.4	0.00	0.17	0.32	0.15	0.11	3.7	29
771206	1300	6.7	38.5	0.15	0.13	0.29	0.26	0.05	4.1	36

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770819	1500	12.0	2.8	6.8	6.0	7.2	[illegible]	70	48	0.00
770908	0805	10.0	2.7	8.5	6.8	5.2	[illegible]	40	64	2.0
770928	1200	13.0	4.2	8.6	7.6	5.7	540	32	76	5.0K
771019	1045	9.3	4.6	8.0	2.0	6.4	630	30	92	5.0K
771110	0740	61.0	3.4	5.6	9.0	6.5	3700	130	0	5.0K
771206	1300	10.0	2.6	5.2	8.0	7.8	[illegible]	[illegible]	78	[illegible]

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 105 C MG/L	70300 RESIDUE DISS-180 C MG/L
770819	1500	110000	0	60	14.0	1.9	3.7	13	78
770908	0805	17000	4	15	8.3	6.9	23.0	3	97
770928	1200	650	100	60	35.0	3.5	4.8	37	59
771019	1045	800	19	54	[illegible]	5.7	17.0	54	133
771110	0740	2100	45	160	5.3	5.6	18.0	33	[illegible]
771206	1300	4500	52	18	6.8	[illegible]	23.0	35	37

Table A-1.--Continued

Station Number 31

STATION - 02427470   ALA R NR CATHERINE   ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770822	0900	27.0	20.0	0.7	85	200	129	6.1	1.3	7.0
770908	0915	28.0	60.0	0.7	95	180	114	6.2	0.0	
770928	1300	22.0	30.0	0.5	90	190	168	9.2	1.1	
771019	1120	14.0	20.0	0.6	60	250	186	8.7	1.2	
771114	1130	10.0	[illegible]	0.7	120	210	150	10.8	0.0	108.0
771206	1500	8.0	45.0	0.7	150	210	120	11.5	0.4	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770822	0900	7.1	39.4	0.00	0.22	0.24	0.14	0.02	1.3	39
770908	0915	7.1	[illegible]	0.12	[illegible]	0.18	0.17	0.04	17.0	34
770928	1300	[illegible]	45.0	0.11	0.16	0.34	0.06	0.01	1.9	53
771019	1120	7.0	50.0	0.29	0.00	0.21	0.04	0.01	1.6	42
771114	1130	7.2	35.0	0.04	0.12	0.33	0.12	0.09	4.0	42
771206	1500	6.5	34.0	0.09	0.19	0.29	0.09	0.05	4.2	36

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770822	0900	11.0	2.7	7.4	7.0	[illegible]	850	300	47	0.0U
770908	0915	9.2	2.0	7.9	6.6	5.8	1200	0	60	0.0U
770928	1300	14.0	4.2	6.2	8.8	5.7	730	0U	52	5.0K
771019	1120	9.0	4.2	8.4	5.2	5.9	990	40	110	7.0
771114	1130	11.0	3.4	5.6	8.0	7.4	1600	20	74	45.0
771206	1500	10.0	2.0	4.8	6.4	7.2	1300	320	68	10.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770822	0900	1100	0	[illegible]	8.0	2.5	4.5	[illegible]	77
770908	0915	4300	[illegible]	36	8.3	3.3	7.7	3	89
770928	1300	1300	200	90	24.0	8.9	23.0	11	74
771019	1120	370	14	[illegible]	11.0	[illegible]	40.0	54	116
771114	1130	2500	16	65	[illegible]	0.3	1.3	7	81
771206	1500	130	[illegible]	19	[illegible]	9.5	32.0	15	[illegible]

Station Number 32

Table A-1.--Continued

STATION - 02427500 ALA R NR MILLERS FERRY ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770822	1000	28.0	19.0	0.8	115	140	133	5.7	2.1	7.0
770908	1025	29.0	30.0	0.8	110	170	116	6.2	0.2	
770928	1515	22.0	30.0	0.6	80	170	170	9.2	7.0	
771019	1140	14.0	25.0	0.6	60	250	192	8.7	1.2	
771114	1210	10.0	40.0	0.7	120	220	137	10.4	0.0	98.0
771206	1605	7.0	400.0	0.8	140	280	128	12.6	1.0	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770822	1000	7.0	36.1	0.00	0.16	0.24	0.07	0.03	0.8	38
770908	1025	7.2	37.7	0.28	0.16	0.18	0.26	0.03	18.0	36
770928	1515	7.4	45.1	0.15	0.78	0.20	0.07	0.00	2.5	53
771019	1140	7.1	49.2	1.00K	0.06	0.26	0.12	0.03	2.0	42
771114	1210	7.4	34.4	0.01	0.00	0.33	0.12	0.04	3.2	42
771206	1605	6.0	35.3	0.00	0.33	0.34	0.23	0.18	4.3	37

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770822	1000	11.0	2.6	6.8	6.2	7.0	790	50	47	0.0U
770908	1025	9.9	2.7	9.0	5.0	5.0	910	40	52	0.0U
770928	1515	14.0	4.3	6.6	8.0	5.5	370	48	58	5.0K
771019	1140	9.1	4.8	8.2	3.2	6.3	720	20	100	5.0K
771114	1210	11.0	3.5	6.0	8.2	6.7	1700	190	83	4.0
771206	1605	10.0	2.9	5.6	8.2	7.4	1200	210	62	17.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770822	1000	200	20	230	9.2	3.3	14.0	11	85
770908	1025	6800	0	34	9.6	7.6	23.0	10	59
770928	1515	1000	0	120	[illegible]	[illegible]	18.0	25	57
771019	1140	750	13	55	13.0	[illegible]	40.0	11	121
771114	1210	1200	32	48	5.3	0.5	19.0	17	85
771206	1605	2900	47	16	11.0	15.0	51.0	20	65

Station Number 33

Table A-1.--Continued

STATION - 02427504 ALA R MILLERS FERRY NR CAMDEN ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770822	1215	30.0	40.0	0.8	95	160	131	6.0	1.6	15.0
770908	1345	29.0	40.0	0.6	100	170	122	6.8	0.7	
770928	1600	21.5	30.0	0.6	90	180	170	8.5	3.0	
771019	1300	14.0	50.0	0.6	110	240	195	8.7	1.3	
771114	1405	10.0	50.0	0.7	110	210	142	10.5	0.0	88.0
771207	0905	7.0	55.0	0.8	130	240	104	11.2	1.9	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770822	1215	7.1	38.1	0.07	0.00	0.24	0.21	0.03	1.5	39
770908	1345	7.3	35.3	0.17	0.10	0.17	0.16	0.03	4.9	35
770928	1600	7.3	47.5	0.10	0.45	0.21	0.11	0.03	8.1	45
771019	1300	7.1	51.7	0.01	0.23	0.24	0.05	0.04	1.8	56
771114	1405	7.4	38.9	0.04	0.52	0.25	0.12	0.00	15.0	42
771207	0905	7.0	37.7	0.00	0.24	0.30	0.19	0.12	3.9	43

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770822	1215	11.0	2.7	7.4	5.4	7.5	760	40	49	0.00
770908	1345	9.6	2.6	17.0	4.4	5.5	890	10	52	4.0
770928	1600	11.0	4.3	8.4	5.6	6.2	360	10	38	5.0K
771019	1300	14.0	5.0	8.2	8.0	6.0	620	80	110	5.0K
771114	1405	11.0	3.4	5.2	8.2	4.5	1700	250	70	25.0
771207	0905	1.2	3.0	5.2	9.0	6.9	1200	210	66	17.0

DATE	TIME	31501 TOT COLI MF IMMED /100ML	31616 FEC COLI MF [illegible] /100ML	31673 FECSTREP MF KF AGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770822	1215	50	8	630	12.0	2.3	2.0	15	79
770908	1345	2500	0	66	6.3	6.9	22.0	15	85
770928	1600	1000	200	50	19.0	4.8	11.0	16	64
771019	1300	440	13	100	6.7	5.5	19.0	30	112
771114	1405	3000	15	36	3.1	2.2	7.3	20	88
771207	0905	3200	34	15	5.2	5.1	16.0	10	60

Station Number 34

Table A-1.--Continued

STATION - 02427507 ALA R AB POWERHOUSE AT MILLERS F ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770822	1430	30.0	30.0	0.6	60	190	137	6.4	1.8	12.0
770908	1520	29.0	40.0	0.8	120	180	112	6.6	0.3	
770929	1010	20.0	30.0	0.7	80	160	150	7.0	0.7	
771019	1400	14.0	40.0	0.7	135	240	198	8.7	1.2	
771114	1515	10.0	35.0	0.6	140	210	140	9.9	0.0	88.0
771207	1100	6.5	60.0	0.7	150	200	124	12.2	0.4	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770822	1430	7.2	37.7	0.07	0.00	0.23	0.19	0.04	1.1	39
770908	1520	7.2	36.1	0.13	0.44	0.19	0.24	0.02	2.7	36
770929	1010	7.3	45.9	0.10	0.64	0.25	0.10	0.00	1.3	5
771019	1400	7.1	47.6	0.09	0.13	0.20	0.15	0.00	2.1	50
771114	1515	7.3	35.3	0.01	0.10	0.31	0.12	0.02	5.1	42
771207	1100	7.5	34.4	0.03	0.14	0.30	0.23	0.12	3.9	38

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770822	1430	11.0	2.7	7.8	5.8	7.4	1000	50	69	0.0U
770908	1520	9.9	2.7	8.4	6.2	6.7	1600	20	110	0.0U
770929	1010	14.0	4.4	9.0	8.4	7.2	620	10	40	6.0
771019	1400	12.0	4.8	7.6	5.0	5.6	640	20	122	9.0
771114	1515	11.0	3.4	5.2	7.0	9.1	2300	150	110	11.0
771207	1100	10.0	3.0	3.6	8.0	7.0	1600	140	68	19.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770822	1430	35	24	1700	19.0	4.9	18.0	15	88
770908	1520	5600	0	130	9.4	9.0	26.0	21	84
770929	1010	2800	4	1800	9.9	[illegible]	16.0	18	76
771019	1400	490	11	190	7.6	3.7	12.0	16	103
771114	1515	1700	48	200	3.8	3.9	13.0	10	82
771207	1100	1900	51	21	6.7	7.1	22.0	21	75

Station [illegible]

Table A-1.--Continued

STATION - 02427511 ALA R NR MIDWAY ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L	00400 PH SU	00410 T ALK CACO3 MG/L
770823	0815	29.0	18.0	0.7	95	280	128	6.7	0.7	10.0	7.1	34.0
770909	0920	28.0	60.0	0.7	100	140	124	6.2	0.8		7.0	37.0
770929	1135	[illegible]	30.0	0.7	140	200	162	7.1	1.4		7.2	46.0
771020	0800	13.0	55.0	0.7	128	250	184	9.7	0.0		7.3	53.0
771115	0945	9.0	50.0	0.7	120	200	136	11.8	0.5	36.0	7.4	37.0
771207	1230	7.0	35.0	0.7	150	210	125	12.0	0.6		7.1	34.0

DATE	TIME	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00955 SILICA DISOLVED MG/L
770823	0815	0.04	0.18	0.23	0.19	0.04	0.9	42	12.0	2.8	6.8	6.8
770909	0920	0.20	0.19	0.19	0.19	0.01	2.6	35	9.7	2.6	7.6	5.1
770929	1135	0.11	0.72	0.23	0.09	0.05	1.7	53	14.0	4.4	8.2	5.7
771020	0800	0.03	0.25	0.21	0.03	0.00	2.7	42	8.7	5.0	8.4	7.2
771115	0945	0.19	0.00	0.30	0.15	0.02	4.1	42	11.0	3.5	4.4	8.1
771207	1230	0.00	0.90	0.29	0.18	0.12	3.9	40	11.0	3.0	4.0	7.1

DATE	TIME	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNSE MN UG/L	01056 MANGNESE MN,DISS UG/L	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770823	0815	790	40	65	0.00	220	20	170	2.1	6.7	13	77
770909	0920	880	30	44	0.00	480	0	140	6.8	20.0	26	82
770929	1135	510	5K	63	5.0	1000	0	1200	4.6	14.0	4	105
771020	0800	790	70	95	5.0K	7600	900	60	2.6	7.9	20	139
771115	0945	1500	170	71	16.0	2300	52	130	5.9	19.0	20	83
771207	1230	1600	190	180	21.0	1900	51	24	3.9	13.0	16	80

Station Number 36

Table A-1.--Continued

STATION - 02427745 ALA R NR YELLOW BLUFF ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L	00400 PH SU	00410 T ALK CACO3 MG/L
770823	0930	29.0	12.0	0.8	42	230	128	6.4	1.3	4.0	7.0	39.0
770909	1000	27.0	45.0	0.8	100	160	124	6.6	1.0		7.2	38.0
770929	1305	20.0	20.0	0.6	100	180	170	7.2	0.3		7.4	46.0
771020	1100	13.0	36.0	0.6	88	250	195	9.7	0.2		7.3	57.0
771115	1045	9.0	40.0	0.7	130	180	140	11.6	0.1	32.0	7.5	36.0
771207	1313	7.0	30.0	0.6	150	220	127	12.2	0.0		7.3	34.0

DATE	TIME	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00955 SILICA DISOLVED MG/L
770823	0930	0.03	0.16	0.20	0.24	0.04	0.5	38	11.0	2.6	6.8	7.6
770909	1000	0.11	0.53	0.19	0.23	0.03	2.6	[illegible]	9.8	2.6	6.2	5.4
770929	1305	0.02	0.86	0.23	0.06	0.03	1.6	50	13.0	4.2	9.0	6.1
771020	1100	0.01K	0.16	0.23	0.17	0.00	2.4	[illegible]	12.0	5.2	8.0	6.0
771115	1045	0.03	0.23	0.28	0.12	0.02	[illegible]	42	11.0	3.4	5.2	5.6
771207	1313	0.06	0.12	0.30	0.22	0.12	4.9	38	10.0	3.1	5.6	7.8

DATE	TIME	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DIS-180 C MG/L
770823	0930	1300	40	48	2.0	400	0	12	3.1	[illegible]	17	76
770909	1000	880	70	43	6.0	2800	0	250	10.0	[illegible]	11	68
770929	1305	420	0K	50	18.0	2100	12	150	5.3	26.0	27	104
771020	1100	820	50	110	7.0	2200	480	60	4.7	13.0	43	111
771115	1045	1800	140	76	16.0	1700	91	[illegible]	5.0	17.0	22	87
771207	1313	1400	180	70	15.0	2000	36	31	14.0	4.5	42	81

Table A-1.--Continued

Station Number [illegible]

STATION - 02428200 ALABAMA RIVER AT LOWER PEACH TREE ALABAMA RIVER

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L	00400 PH SU	00410 T ALK CACO3 MG/L
770823	1100	30.0	55.0	0.6	85	240	129	6.6	0.8	3.0	6.4	30.0
770912	1300	23.0	50.0	0.7	120	220	134	7.1	0.3		7.1	37.0
771003	1245	19.0	30.0	0.7	90	100	152	7.8	0.3		6.8	49.0
771024	1230	14.0	35.0	0.6	80	220	191	8.9	0.1		7.0	55.0
771115	1610	9.0	65.0	0.7	130	180	146	11.7	0.2	36.0	7.4	35.0
771208	0915	7.0	0.0	0.7	130	190	118	11.2	0.2		7.7	46.0

DATE	TIME	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00955 SILICA DISOLVED MG/L
770823	1100	0.00	0.18	0.23	0.20	0.04	1.5	39	11.0	2.7	6.8	7.9
770912	1300	0.10	0.33	0.23	0.24	0.02	2.7	33	9.1	2.6	6.6	5.4
771003	1245	0.03	0.45	0.22	0.08	0.03	2.5	54	12.0	4.5	8.8	7.6
771024	1230	0.01K	0.16	0.24	0.14	0.00	2.0	56	14.0	5.0	8.8	6.6
771115	1610	0.02	0.00	0.21	0.12	0.09	4.2	42	11.0	3.4	5.6	9.2
771208	0915	0.06	0.11	0.29	0.16	0.15	4.1	38	10.0	3.1	3.6	6.8

DATE	TIME	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770823	1100	1500	60	73	0.00	60	40	110	4.1	9.7	29	77
770912	1300	1400	120	81	6.0	3700	4	46	0.7	16.0	23	83
771003	1245	630	33	71	5.0K	2400	54	77	2.6	7.0	70	65
771024	1230	830	20	91	5.0K	7100	34	62	4.9	16.0	43	120
771115	1610	1400	120	79	14.0	2500	48	100	5.8	15.0	31	76
771208	0915	1000	340	83	27.0	1900	30	18	4.2	16.0	43	71

Table A-1.--Continued

Station Number 38

STATION - 02428335 ALA R ABOVE MCLEOD CK NR FRANKLIN ALABAMA RIVER

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L	00400 PH SU	00410 T ALK CACO3 MG/L
770824	0730	28.0	52.0	0.6	160	100	126	5.7	1.2	5.0	7.0	34.0
.70912	1415	22.0	50.0	0.7	120	220	124	6.2	0.5		7.2	36.0
771003	1420	19.0	40.0	0.6	100	120	163	7.4	0.3		7.5	52.0
771024	1330	14.0	25.0	0.7	70	230	189	8.8	1.0		7.0	56.0
771116	0755	10.0	30.0	0.7	120	200	136	14.3	0.4	34.0	7.4	34.0
771208	0955	7.0	45.0	0.8	130	270	140	10.8	0.5		7.2	33.0

DATE	TIME	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L	00915 CALCIUM CA.DISS MG/L	00925 MGNSIUM MG.DISS MG/L	00940 CHLORIDE CL MG/L	00955 SILICA DISOLVED MG/L
77082.	0730	0.00	0.08	0.20	0.19	0.04	1.8	36	10.0	2.5	6.4	8.9
770912	1415	0.45	0.17	0.21	0.13	0.01	1.8	35	9.4	2.7	7.5	5.2
771003	1420	0.02	0.58	0.22	0.10	0.03	1.5	51	13.0	4.4	8.8	7.5
771024	1330	0.01K	0.18	0.25	0.13	0.00	2.9	56	14.0	5.1	8.6	5.9
771116	0755	0.00	0.16	0.20	0.11	0.09	3.9	39	10.0	3.4	5.6	7.0
771208	0955	0.00	0.13	0.29	0.24	0.15	4.1	38	10.0	3.0	6.0	7.2

DATE	TIME	01045 IRON FE.TOT UG/L	01046 IRON FE.DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN.DISS UG/L	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770824	0730	1400	120	48	37.0	160	4	140	2.4	6.4	42	78
770912	1415	1300	40	97	3.0	1800	10	55	6.4	24.0	6	74
771003	1420	710	22	75	5.0K	1600	26	100	4.5	14.0	32	96
771024	1330	1200	20	77	5.0K	4000	5	58	1.2	3.9	17	160
771116	0755	4700	340	87	8.0	2300	20	120	3.2	9.9	9	66
771208	0955	1700	260	80	19.0	1400	26	27	3.2	12.0	25	55

Table A-1.--Continued

Station Number 3[illegible]

STATION - 02428345 ALA R AT DAVIS FERRY NR FRANKLIN ALABAMA RIVER

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L	00400 PH SU	00410 T ALK CACO3 MG/L
770824	0930	28.0	75.0	0.6	195	160	115	5.5	0.1	5.0	7.6	38.0
770912	1515	22.0	55.0	0.8	120	320	122	6.1	0.3		7.1	37.0
771003	1530	20.0	35.0	0.8	100	130	158	7.4	0.3		7.6	48.0
771024	1310	14.0	25.0	0.7	60	240	188	8.7	1.5		7.0	54.0
771116	0830	10.0	40.0	0.7	140	200	138	12.2	0.6	52.0	7.8	40.0
771208	1005	7.0	35.0	0.8	170	250	126	10.8	1.0		7.4	43.0

DATE	TIME	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00955 SILICA DISOLVED MG/L
770824	0930	0.06	0.05	0.20	0.20	0.03	2.1	71	24.0	2.5	6.8	8.1
770912	1515	0.60	0.15	0.23	0.17	0.01	2.7	35	9.5	2.7	7.0	5.7
771003	1530	0.08	0.51	0.23	0.06	0.00	2.7	54	12.0	4.5	8.4	10.0
771024	1310	0.02	0.10	0.25	0.09	0.00	2.3	52	12.0	5.2	8.8	6.4
771116	0830	0.01	0.67	0.24	0.13	0.13	3.2	39	10.0	3.4	5.2	8.8
771208	1005	0.00	0.13	0.29	0.17	0.15	3.6	41	11.0	3.1	5.2	7.6

DATE	TIME	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32212 CHLRPHY. B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770824	0930	1200	90	49	9.0	380	93	310	2.3	7.5	19	72
770912	1515	1600	70	77	5.0	3000	60	140	8.3	30.0	17	90
771003	1530	430	45	51	6.0	1800	20	20	10.0	36.0	55	119
771024	1310	550	170	66	15.0	3600	5	59	1.1	4.8	6	111
771116	0830	1700	160	96	19.0	1600	57	100	3.7	14.0	10	93
771209	1005	1800	570	64	16.0	5400	32	31	5.6	21.0	20	60

Table A-1.--Continued

Station Number 40

STATION - 02428380 ALA R BELOW CANE CREEK NR CHANCE ALABAMA RIVER

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L	00400 PH SU	00410 T ALK CACO3 MG/L
770824	1030	28.0	61.0	0.7	120	190	119	5.8	1.7	6.0	7.0	77.0
770912	1610	22.0	30.0	0.7	120	210	122	6.6	0.5		7.2	35.0
771003	1615	20.0	25.0	0.8	95	130	156	7.2	0.3		7.3	43.0
771024	1425	14.0	20.0	0.8	70	240	192	8.7	1.7		7.0	54.0
771116	0935	10.0	40.0	0.7	120	280	141	12.4	0.7	38.0	7.3	36.0
771208	1025	7.0	40.0	0.8	110	290	127	11.2	0.5		7.0	36.0

DATE	TIME	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00955 SILICA DISOLVED MG/L
770824	1030	0.03	0.03	0.26	0.17	0.05	1.5	41	12.0	2.6	6.8	8.2
770912	1610	0.00	0.16	0.22	0.11	0.04	2.8	35	9.4	2.7	6.9	6.7
771003	1615	0.04	0.65	0.22	0.06	0.02	1.3	36	8.0	4.2	8.6	6.5
771024	1425	0.01K	0.06	0.23	0.06	0.00	1.6	64	18.0	5.0	9.2	6.9
771116	0935	0.05	0.16	0.27	0.12	0.02	4.1	42	11.0	3.4	6.0	6.2
771208	1025	0.00	0.12	0.32	0.17	0.09	4.0	36	10.0	3.0	5.6	6.5

DATE	TIME	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770824	1030	1200	330	140	80.0	460	0	160	1.1	.6	21	77
770912	1610	1400	30	81	0.0K	2200	4	58	3.7	14.0	12	74
771003	1615	750	10	47	5.0K	2800	23	20	4.0	14.0	82	100
771024	1425	550	30	100	9.0	6200	0	54	4.9	17.0	11	93
771116	0935	790	200	69	40.0	1800	28	110	2.6	6.1	25	82
771208	1025	1300	220	60	29.0	1900	24	62	3.8	13.0	9	61

Station Number 4?

Table A-1.--Continued

STATION - 02428395 SILVER CR NR FINCHBURG ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770824	1245	29.0	61.0	0.7	155	140	120	7.0	1.9	3.0
770912	1715	23.0	30.0	0.8	120	210	120	6.4	1.0	
771003	1700	19.0	40.0	0.5	80	130	138	9.2	0.3	
771024	1515	13.0	25.0	0.8	70	240	191	8.7	1.4	
771116	1010	10.0	30.0	0.8	80	280	141	12.4	0.9	134.0
771208	1107	5.0	50.0	0.5	160	240	100	10.4	0.5	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770824	1245	7.1	36.1	0.05	0.07	0.02	0.20	0.01	2.1	40
770912	1715	7.2	35.3	0.79	0.14	0.17	0.16	0.00	2.7	33
771003	1700	7.8	44.3	0.03	0.62	0.04	0.05	0.00	3.3	35
771024	1515	7.0	53.3	0.02	0.20	0.23	0.10	0.00	1.9	41
771116	1010	7.5	41.8	0.02	0.04	0.14	0.09	0.00	22.0	43
771208	1107	7.2	26.2	0.00	0.15	0.08	0.12	0.01	3.5	32

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770824	1245	12.0	2.4	6.0	5.4	8.9	1500	30	110	61.0
770912	1715	9.3	2.4	7.1	7.0	7.0	1200	0U	47	0.0U
771003	1700	8.0	3.6	7.2	7.2	7.5	1200	55	62	5.0K
771024	1515	8.4	4.9	8.0	6.0	6.7	620	20	69	16.0
771116	1010	12.0	3.1	6.0	7.0	8.8	1400	190	31	28.0
771208	1107	10.0	1.6	3.2	0.8	15.0	1700	300	60	31.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770824	1245	45000	0	120	16.0	2.7	6.2	18	81
770912	1715	890	13	290	8.4	4.5	13.0	22	79
771003	1700	1500	29	560	16.0	0.0	0.0	9	66
771024	1515	1700	6	69	13.0	5.8	19.0	23	122
771116	1010	970	5	63	7.4	1.5	5.7	15	93
771208	1107	46	200	120	6.0	4.2	14.0	25	61

Table A-1.--Continued

Station Number 42

STATION - 02428396 ALA R BELOW SILVER CR NR FINCHBG ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770824	1435	30.0	30.0	0.7	130	[illegible]	122	6.7	2.2	2.0
770913	1015	22.0	40.0	0.7	110	230	125	6.1	0.0	
771004	1120	19.0	30.0	0.8	80	140	142	7.6	0.3	
771025	0945	14.0	40.0	1.0	65	230	189	9.2	1.5	
771116	1150	10.0	40.0	0.7	120	280	142	12.4	0.6	66.0
771208	1130	7.0	30.0	0.8	120	240	173	10.8	0.2	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770824	1435	7.1	32.8	0.09	0.11	0.20	0.18	0.02	1.6	38
770913	1015	7.2	36.1	0.30	0.19	0.22	0.20	0.03	2.1	34
771004	1120	7.4	46.7	0.10	0.60	0.21	0.09	0.04	3.6	50
771025	0945	7.5	59.0	0.01K	0.12	0.25	0.13	0.00	1.9	52
771116	1150	7.3	37.7	0.00	0.57	0.29	0.15	0.03	3.3	42
771208	1130	7.1	32.8	0.21	0.19	0.30	0.21	0.15	6.4	37

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770824	1435	11.0	2.6	6.4	7.2	[illegible]	[illegible]	120	38	2.0
770913	1015	9.3	2.6	6.5	2.0	6.0	[illegible]	40	51	8.0
771004	1120	13.0	4.3	8.0	9.2	6.6	520	11	50	13.0
771025	0945	12.0	5.2	8.8	4.0	6.1	500	60	59	20.0
771116	1150	11.0	3.4	6.0	8.0	9.3	[illegible]	180	57	5.0
771208	1130	10.0	2.9	5.2	1.1	6.8	[illegible]	130	61	14.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770824	1435	480	0	61	9.1	[illegible]	19.0	14	82
770913	1015	24000	0	21	5.7	3.1	9.8	23	73
771004	1120	7000	4	17	16.0	0.0	0.0	2	73
771025	0945	21000	6	3	[illegible]	[illegible]	[illegible]	6	94
771116	1150	[illegible]	20	60	3.4	[illegible]	9.5	9	88
771208	1130	1800	13	36	4.9	[illegible]	16.0	40	67

Station Number 4[illegible]

Table A-1.--Continued

STATION - 02428399 ALA R NR CLAIBORNE LOCK & DAM ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMIR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770824	1630	29.0	35.0	0.8	110	145	118	7.0	2.8	5.0
770913	1050	22.0	45.0	0.7	110	190	121	6.3	0.5	
771004	1155	19.0	40.0	0.8	80	140	151	7.7	0.3	
771025	1010	14.0	15.0	0.9	60	230	189	9.3	1.9	
771116	1225	11.0	45.0	0.7	120	280	99	12.4	0.4	60.0
771208	1220	7.5	35.0	0.8	120	210	138	10.8	0.7	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770824	1630	7.1	36.1	0.07	0.16	0.24	0.19	0.02	1.1	38
770913	1050	7.1	36.1	0.67	0.08	0.21	0.20	0.03	21.0	34
771004	1155	7.5	46.7	0.33	0.30	0.24	0.10	0.07	1.9	53
771025	1010	7.1	52.5	0.01K	0.11	0.26	0.17	0.00	1.7	39
771116	1225	7.2	36.1	0.06	0.00	0.32	0.15	0.06	3.5	29
771208	1220	7.4	38.5	0.13	0.10	0.30	0.19	0.15	4.0	38

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770824	1630	11.0	2.6	5.6	5.4	7.6	910	90	42	0.00
770913	1050	9.3	2.7	6.5	3.0	5.9	1000	170	51	12.0
771004	1155	14.0	4.3	7.4	8.0	6.3	450	25	45	22.0
771025	1010	7.3	5.1	8.0	6.0	6.4	310	10	58	7.0
771116	1225	6.1	3.4	5.0	8.2	7.9	1800	210	73	14.0
771208	1220	10.0	3.0	7.2	5.2	7.0	1200	170	55	5.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770824	1630	9000	100	67	6.7	2.1	5.7	12	78
770913	1050	400	0	49	8.8	6.8	22.0	20	88
771004	1155	3100	0	57	4.6	3.0	11.0	40	74
771025	1010	4100	6	36	5.7	6.0	22.0	6	73
771116	1225	2000	20	64	3.7	2.9	10.0	10	68
771208	1220	1200	24	32	4.7	5.1	18.0	5	62

Table A-1.--Continued

Station Number 44

STATION - 02428405 ALA R 0.4 MI. BELOW CLAIBORNE LD ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770824	1800	29.0	29.0	0.7	110	160	115	8.7	2.0	8.0
771004	1420	19.0	50.0	0.7	100	140	162	10.8	0.3	
771025	1100	14.0	40.0	0.8	60	190	189	11.8	0.3	
771117	0800	10.0	70.0	0.7	130	270	111	13.5	1.1	18.0
771208	1345	8.0	40.0	0.7	110	210	127	11.8	1.7	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770824	1800	7.5	36.1	0.03	0.11	0.23	0.22	0.03	2.1	38
771004	1420	7.5	46.7	1.10	0.12	0.20	0.09	0.00	15.0	38
771025	1100	6.8	52.5	0.01K	0.04	0.25	0.23	0.00	2.4	51
771117	0800	7.4	38.5	0.01	0.22	0.32	0.09	0.03	3.3	42
771208	1345	7.4	43.5	0.00	0.11	0.29	0.18	0.15	3.8	38

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00946 SULFATE SO4-DISS MG/L	00955 SILICA DISSOLVED MG/L	01045 IRON FE [illegible]	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770824	1800	11.0	2.5	5.6	6.2	8.2	[illegible]	100	45	0.0U
771004	1420	8.0	4.4	8.0	8.0	5.4	[illegible]	11	72	5.0K
771025	1100	12.0	5.0	9.2	10.0	6.2	[illegible]	[illegible]	82	12.0
771117	0800	11.0	3.4	6.0	7.0	8.0	[illegible]	150	63	21.0
771208	1345	10.0	3.0	5.2	7.0	7.0	1400	250	50	12.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES SUSP AT 105 C MG/L	70300 RESIDUE DISS-180 C MG/L
770824	1800	1800	12	2-0	11.0	4.9	15.0	17	81
771004	1420	5300	12	37	5.6	9.1	26.0	43	70
771025	1100	4000	6	42	2.8	0.7	2.5	35	138
771117	0800	3700	8	62	3.6	4.6	12.0	16	82
771208	1345	1000	20	32	3.5	2.7	5.7	10	62

Table A-1.--Continued

Station Number 45

STATION - 02429500 ALA R AT CLAIBORNE ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770825	0730	28.0	48.0	7.0	138	50	110	8.7	1.7	5.0
770914	0830	27.0	50.0	0.7	140	160	131	6.3	0.2	
771004	1450	19.0	40.0	0.6	105	130	156	10.6	0.3	
771025	1135	14.0	40.0	0.9	80	210	188	11.3	0.5	
771117	0850	10.0	40.0	0.7	150	270	111	13.6	0.0	24.0
771208	1400	8.0	30.0	0.7	110	180	128	12.2	0.8	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770825	0730	7.3	43.5	0.08	0.38	0.23	0.25	0.05	1.8	38
770914	0830	7.3	35.2	0.26	0.16	0.22	0.15	0.03	3.7	36
771004	1450	7.5	47.5	0.03	0.40	0.23	0.09	0.05	2.0	38
771025	1135	6.5	54.1	0.01K	0.16	0.24	0.09	0.01	1.8	41
771117	0850	7.4	37.7	0.00	0.17	0.33	0.09	0.02	4.2	32
771208	1400	7.7	41.3	0.01	0.09	0.31	0.20	0.09	3.8	38

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4-DISS MG/L	00955 SILICA DISOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770825	0730	11.0	2.5	6.8	5.4	7.0	1200	50	44	1.0
770914	0830	10.0	2.7	4.4	3.0	6.4	1200	60	64	17.0
771004	1450	8.0	4.9	7.8	8.0	5.4	710	23	100	5.0
771025	1135	8.1	5.0	9.4	8.0	5.1	490	10	63	5.0
771117	0850	7.3	3.3	5.2	6.4	7.2	2700	310	87	21.0
771208	1400	10.0	3.0	5.6	5.0	7.1	1300	290	72	23.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP KF/AGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES-SUSP AT 180 C MG/L	70300 RESIDUE DISS-180 C MG/L
770825	0730	2300	10	190	4.1	1.4	2.0	16	80
770914	0830	2400	0	120	7.0	5.2	15.0	53	91
771004	1450	7900	4	14	6.6	8.4	27.0	15	54
771025	1135	8000	10	19	11.0	15.0	47.0	5	177
771117	0850	2700	40	50	4.7	5.2	17.0	10	82
771208	1400	1500	8	37	3.7	2.5	9.6	10	61

Table A-1.--Continued

Station Number 46

STATION - 02429506 ALA R AT CEDAR CR NR GOSPORT ALABAMA RIVER BASIN

DATE	TIME	00010 WATER TEMP CENT	00076 TURB TRBIDMTR HACH FTU	00078 TRANSP SECCHI METERS	00080 COLOR PT-CO UNITS	00090 REDOX ORP MV	00094 CNDUCTVY FIELD MICROMHO	00299 DO PROBE MG/L	00310 BOD 5 DAY MG/L	00335 COD LOWLEVEL MG/L
770825	0950	29.0	45.0	0.8	130	60	111	8.8	2.1	4.0
771004	1545	20.0	30.0	0.6	100	130	161	10.6	0.3	
771025	1230	14.0	50.0	0.8	80	210	168	11.0	0.2	
771117	0940	10.0	50.0	0.7	150	250	112	13.5	0.2	14.0
771208	1425	8.0	25.0	0.8	120	190	128	11.8	0.5	

DATE	TIME	00400 PH SU	00410 T ALK CACO3 MG/L	00610 NH3+NH4- N TOTAL MG/L	00625 TOT KJEL N MG/L	00630 NO2&NO3 N-TOTAL MG/L	00665 PHOS-TOT MG/L P	00671 PHOS-DIS ORTHO MG/L P	00680 T ORG C C MG/L	00900 TOT HARD CACO3 MG/L
770825	0950	7.1	39.4	0.04	0.32	0.22	0.26	0.04	2.0	38
771004	1545	6.3	46.7	0.17	0.28	0.73	0.39	0.04	1.7	32
771025	1230	6.6	50.0	0.01K	0.14	[illegible]	0.20	0.00	3.0	34
771117	0940	7.5	38.5	0.00	0.70	[illegible]	0.12	[illegible]	4.1	28
771208	1425	8.0	36.9	0.00	0.12	[illegible]	0.20	0.01	4.5	40

DATE	TIME	00915 CALCIUM CA,DISS MG/L	00925 MGNSIUM MG,DISS MG/L	00940 CHLORIDE CL MG/L	00945 SULFATE SO4 DISS MG/L	00955 SILICA DISSOLVED MG/L	01045 IRON FE,TOT UG/L	01046 IRON FE,DISS UG/L	01055 MANGNESE MN UG/L	01056 MANGNESE MN,DISS UG/L
770825	0950	11.0	2.4	6.2	7.4	7.8	[illegible]	50	51	0.0U
771004	1545	6.0	4.0	9.0	9.0	[illegible]	[illegible]	0U	65	5.0K
771025	1230	7.2	5.0	1.0	2.0	[illegible]	[illegible]	[illegible]	96	12.0
771117	0940	6.1	3.2	5.6	5.0	[illegible]	[illegible]	[illegible]	50	16.0
771208	1425	11.0	2.9	4.0	[illegible]	[illegible]	[illegible]	[illegible]	50	16.0

DATE	TIME	31501 TOT COLI MFIMENDO /100ML	31616 FEC COLI MFM-FCBR /100ML	31673 FECSTREP MFKFAGAR /100ML	32210 CHLRPHYL A UG/L	32212 CHLRPHYL B UG/L	32214 CHLRPHYL C UG/L	70299 RES SUSP AT 105 C MG/L	70300 RESIDUE DISS-180 C MG/L
770825	0950	3700	91	150	6.2	[illegible]	[illegible]	24	82
771004	1545	3000	34	80	5.3	[illegible]	15.0	21	60
771025	1230	11000	50	40	54.0	[illegible]	[illegible]	5	94
771117	0940	3300	25	60	4.9	[illegible]	22.0	16	52
771208	1425	1800	74	1200	3.8	3.5	13.0	10	67

Table A-[illegible].--Inventory of municipal and industrial discharges to the Alabama River Basin, September 1975

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	[illegible]
Econchate WWTP Montgomery (M-37-51-002)	350.3	T17N/R18E/S30 SE1/4	32°25'04"	86°18'.[illegible]
	Alabama River (FW)		AL0022225	14.

Standard rate trickling filter with grease removal and Cl_2 disinfection. Sludge to thickener, anaerobic digester and sand drying beds with ultimate disposal as fertilizer.

	Permit	Reported (1975) July	Aug.	Sept.	Nov.
Flow, mgd		10.9	10.2	11.3	[illegible]
pH, S.U.	6-9	6.6-7.1	6.5-7.2	6.2-7.2	6.4-7.0
BOD_5 (infl/effl), mg/l	30	158/5	139/7	172/7	187/[illegible]
SS (infl/effl), mg/l	30	206/14	160/27	169/10	154/11
Cl_2, mg/l (max.)	0.5	2.0	1.4	1.4	[illegible]
Fecal Coli, No/100 ml	200	598	4610	3110	[illegible]
Issuance Date	6/14/74				
Expiration Date	3/31/79				
Compliance Date	6/14/74				

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
[illegible] WWTP Montgomery (M-37-51-005)	338.6	T16N/R17E/S4 NE1/4	32°23'33"	86°21'[illegible]"
	Alabama River (FW)		AL0022241	3.0

Standard rate trickling filter with grease removal and Cl_2 disinfection. Sludge to anaerobic digester to sand drying beds with ultimate disposal as fertilizer.

	Permit	Reported (1975) July	Aug.	Sept.	Nov.
Q, mgd		2.1	2.4	2.8	2.7
pH, S.U.	6-9	7.6	6.9-7.6	6.8-7.7	6.8-7.7
BOD_5 (infl/effl), mg/l	30	161/5	138/6	127/7	162/9
SS (infl/effl), mg/l	30	166/7	206/13	138/8	153/10
Cl_2, mg/l (max.)	200	0.5	0.5	0.5	0.5
Fecal Coli, No/100 ml	0.5	800	4020	72	5
Issuance Date	6/14/74				
Expiration Date	3/31/79				
Compliance Date	6/14/74				

Table A-2.--Continued

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Design Flow (mgd)
Prattville WWTP (M-37-01-012)	333.5	T17N/R16E/S16 SW1/4	32°26'5[illegible]"	[illegible]°27'59"
	Autauga Creek (FW)		AL0020397	1.0

High rate trickling filter with Cl_2 disinfection. Sludge to anaerobic digester to sand drying beds with ultimate disposal to landfill.

	Permit	Reported (1975) 7/1-7/28	7/29-8/16	[illegible]
Q, mgd	1.0	1.0	1.66	0.97
pH, S.U.	6-9	6.4-7.6	6.8-7.0	6.9-7.1
BOD_5 (infl/effl), mg/l	75	150/41	200/67	144/48
SS (infl/effl), mg/l	60	95/17	125/38	156/78
Fecal Coli, No/100 ml	200			
Issuance Date	10/15/74			
Expiration Date	6/30/77			
Compliance Date	11/30/74			

	9/16-10/13	10/15-11/17	11/18-12/8
Q, mgd	1.5	1.6	1.3
pH, S.U.	6.7-7.0	6.5-6.8	6.2-7.6
BOD_5 (infl/effl), mg/l	122/36	67/27	120/37
SS (infl/effl), mg/l	102/44	36/12	92/35

Table A-2.--Continued

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Design Flow (mgd)
Catoma Creek WWTP Montgomery (M-37-51-001)	339.5	T16N/R17E/S34 NE1/4	32°19'35"	86°20'32"
	Catoma Creek (FWG)*		AL0022317	9.0

Standard rate trickling filter/conventional activated sludge with grease removal and Cl_2 disinfection. Sludge to anaerobic digester to sand drying beds with ultimate disposal as fertilizer.

	Permit	Reported (1975) July	Aug.	Sept.	Nov.
Q, mgd	9.0	9.5	9.8	9.3	9.1
pH, S.U.	6-9	7.0-7.3	7.0-7.5	6.9-7.3	6.8-7.3
BOD_5 (infl/effl), mg/l	30	311/41	277/39	274/48	325/55
SS (infl/effl), mg/l	30	163/39	147/50	195/60	174/76
Cl_2, mg/l (max.)	0.5	1.3	1.0	1.0	0.91
Fecal Coli, No/100 ml	200	TNTC	583	18,000	18,500
Issuance Date	6/14/74				
Expiration Date	12/ 1/77				
Compliance Date	6/14/74				

Plant sewer system infiltration rate is high.

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
Thorsby WWTP (M-37-11-004)	324.0	T22N/R13E/S1 SE1/4	32°64'55"	86°43'30"
	Charlotte Creek (FWG)*		AL0020478	0.19

Imhoff Tank. Sludge to Landfill.

	Permit
Issuance Date	10/26/73
Expiration Date	9/30/78
Compliance Date	10/26/73
pH, S.U.	6-9
BOD_5, mg/l	30
SS, mg/l	30
Fecal Coli, No/100 ml	200

*Asterisk denotes Water Quality Limited receiving segment.

Table A-2.—Continued

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Design Flow (mgd)
Valley Creek WWTP (Selma) (M-37-24-011)	259.3	T17N/R10E/S35 SE1/4	32°23'42"	87°02'15"
	Alabama River (FW)		AL0022578	6.0

High rate trickling filter with Cl_2 disinfection. Sludge to storage tanks to anaerobic digesters to sand drying beds with ultimate disposal as fertilizer.

	Permit	Reported (1975) July	Aug.	Sept.	Oct.	Nov.
Q, mgd	6.0	3.6	3.8	3.3	3.7	3.4
pH, S.U.	6-9	7.0-7.3	7.0-7.3	7.0-7.4	6.9-7.4	6.6-7.5
BOD_5 (infl/effl), mg/l	30	355/16	449/21	380/21	267/16	336/10
SS (infl/effl), mg/l	30	272/17	382/15	433/20	118/34	291/20
Fecal Coli, No/100 ml	200	108		117	175	182
Issuance Date	6/ 4/74					
Expiration Date	3/31/79					
Compliance Date	6/ 4/74					

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
Marion WWTP (M-37-53-014)	264.1	T19N/R7E/S11 S1/2	32°37'37"	87°20'33"
	Bogue Chitto Creek (FW)*		AL0020681	-

No treatment provided.

	Permit
Issuance Date	6/20/75
Expiration Date	6/30/77
Compliance Date	7/ 1/77
pH, S.U.	6-9
BOD_5, mg/l	30
SS, mg/l	30
NH_3-N, mg/l	18
Fecal Coli, No/100 ml	200

Table A-2.--Continued

<table>
<tr><th rowspan="2">Identification
(AWIC Inventory No.)</th><th>River Mile</th><th>Township/Range
Section/Quadrant</th><th>Latitude</th><th>Longitude</th></tr>
<tr><th colspan="2">Receiving Stream
(Water Use Classification)</th><th>NPDES
Permit No.</th><th>Design
Flow (mgd)</th></tr>
<tr><td rowspan="3">Pine Hill Lagoon
(M-37-66-007)</td><td>188.2</td><td>T12N/R5E/S28
SE1/4</td><td>31°58'40"</td><td>87°34'31"</td></tr>
<tr><td colspan="2">Cub Creek (FW)*</td><td>AL0024147</td><td>0.15</td></tr>
<tr><td colspan="4">Single cell, nonaerated stabilization lagoon.

Permit
Issuance Date 12/31/75
Expiration Date 6/30/77
Compliance Date 7/ 1/77
pH, S.U. 6-9
BOD_5, mg/l 30
SS, mg/l 30
Fecal Coli, No/100 ml 200</td></tr>
<tr><td rowspan="3">Camden North Lagoon
(M-37-66-008)</td><td>191.5</td><td>T12N/R7E/S13
SE1/4</td><td>32°00'36"</td><td>87°18'57"</td></tr>
<tr><td colspan="2">Rockwest Creek (FW)</td><td>AL0023701</td><td>0.09</td></tr>
<tr><td colspan="4">Single cell, nonaerated stabilization lagoon.

Permit
Issuance Date 10/15/74
Expiration Date 6/30/77
Compliance Date 7/ 1/77
pH, S.U. 6-9
BOD_5, mg/l 30
SS, mg/l 30
Fecal Coli, No/100 ml 200</td></tr>
</table>

Table A-2.--Continued

Identification (AWIC Inventory No.)	River Mile / Receiving Stream (Water Use Classification)	Township/Range Section/Quadrant	Latitude / NPDES Permit No.	Longitude / Design Flow (mgd)
Camden West Lagoon (M-37-66-010)	178.1	T12N/R7E/S24 SW1/4	31°59'29"	87°19'37"
	Reed Creek (FW)*		AL0023698	0.09
	Single cell, nonaerated stabilization lagoon.			
			Permit	
	Issuance Date		10/15/74	
	Expiration Date		6/30/77	
	Compliance Date		7/ 1/77	
	pH, S.U.		6-9	
	BOD_5, mg/l		30	
	SS, mg/l		30	
	Fecal Coli, *No/100 ml*		200	
Camden South Lagoon (M-37-66-009)	177.3	T12N/R8E/S32 SW1/4	31°58'22"	87°17'25"
	Town Branch (FW)*		AL0023680	0.36
	Single cell, nonaerated stabilization lagoon.			
			Permit	
	Issuance Date		10/15/74	
	Expiration Date		6/30/77	
	Compliance Date		7/ 1/77	
	pH, S.U.		6-9	
	BOD_5, mg/l		30	
	SS, mg/l		30	
	Fecal Coli, No/100 ml		200	

Table A-2.--Continued

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Design Flow (mgd)
Hudson Branch WWTP Monroeville (M-37-50-005)	143.4	T2N/R8E/S31 SE1/4	31°31'34"	87°17'58"
	Hudson Branch (FW)*		AL0022316	1.4

Aerated lagoon with sludge return.

	Permit	Reported (12/75)
Q, mgd	1.2	0.75
pH, S.U.	6-9	7.3
BOD_5 (infl/effl), mg/l	30	211/67
SS (infl/effl), mg/l	30	58/26
UOD, mg/l	62	
NH_3-N, mg/l	5	
DO, mg/l	6	
Fecal Coli, No/100 ml	200	
Issuance Date	12/16/74	
Expiration Date	6/30/77	
Compliance Date	7/ 1/77	

Plant is to be expanded to 3 mgd capacity and upgraded to include nitrification, Cl_2 disinfection, and post aeration. Approximately 90% of flow is due to Vanity Fair Mills.

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
Broughton St. WWTP Monroeville (M-37-50-006)	137.1	T7N/R7E/S26 S1/2	31°32'16"	87°20'04"
	Tributary to Limestone Creek (FW)*		AL0020702	0.5

High rate trickling filter. Sludge to anaerobic digester to sand drying beds with ultimate disposal to landfill and as fertilizer.

	Permit	Reported (12/75)
Q, mgd		0.35
pH, S.U.	6-9	7.3
BOD_5 (infl/effl), mg/l	30	527/117
SS (infl/effl), mg/l	30	152/22
UOD, mg/l	126	
NH_3-N, mg/l	18	
DO, mg/l	6	
Fecal Coli, No/100 ml	200	< 2
Issuance Date	5/ 9/75	
Expiration Date	6/30/77	
Compliance Date	7/ 1/77	

Will go to proposed Doubles Branch WWTP.

Table A-2.--Continued

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Design Flow (mgd)
Double Branches WWTP Monroeville (AM-1) (Proposed)	136.6	T6N/R7E/S3 NW1/4	31°31'00"	87°21'20"
	Double Branches Creek (FW)		Application Filed	1.0
	Activated sludge with nitrification, Cl_2 disinfection, and post aeration. Sludge will be sent to sludge thickener, aerobic digester, sludge drying beds, and disposed of at landfill. Plant is to be constructed by December, 1977.			
Frisco City WWTP (M-37-50-013)	116.0	T5N/R6E/S2 NE1/4	31°25'58"	87°26'22"
	Bear Creek (FW)*		-	0.15
	Imhoff Tank			

Table A-2.--Continued

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Flow (mgd)
Brockway Glass Montgomery (I-37-51-005)	352.3	T17N/R18E/S29 S1/2	32°25'10"	86°17'03"
	Tributary of Alabama River (FW)		AL0001899	0.024
	No treatment provided for noncontact cooling water.			
			Permit	
	Issuance Date		12/30/74	
	Expiration Date		2/13/80	
	Compliance Date		4/1/76	
	pH, S.U.		6-9	
	Temperature, °F		95	
	Cr(t), mg/l		1.0	
	Zn(t), mg/l		0.25	
	Cl_2, mg/l		0.2	
Illinois Gulf Central Montgomery (I-37-51-015)	341.4	T16N/R17E/S4 SW1/4	32°22'24"	86°20'30"
	Tributary to Alabama River (FW)		AL0004006	-
	No treatment provided for runoff and sanitary wastewater.			
		Permit		Permit
	Issuance Date	11/14/73	Phenols, mg/l	0.25
	Expiration Date	9/30/78	SS, mg/l	30
	Compliance Date	Completion of Constr.	Cr(t), mg/l	0.25
			Cu(t), mg/l	0.2
	pH, S.U.	6-9	Surfactants, mg/l	0.35
	BOD_5, mg/l	30		
	Oil and Grease, mg/l	10	Fecal Coliform, No/100 ml	200

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit	Flow (mgd)
J.P. Stevens Montgomery (I-37-51-024)	362.2	T17N/R18E/S29 NE1/4	[illegible]	[illegible]
	Tributary of Alabama River (FW)		[illegible]	[illegible]

No treatment provided for noncontact cooling water.

	Permit	Reported (6-8/75) 001 Avg.	001 Max.	002 Avg.	002 Max.
Q, mgd		.00096		.00003	
pH, S.U.	6-9		8.3		8.0
Temperature, °F	95	89	89	74	74
SS, mg/l	30	2	2	<2	<2
Cr(t), mg/l	0.5	<0.03	<0.03	<0.03	<0.03
Zn(t), mg/l	0.5	0.2	0.35	1.98	2.40
Cl_2, mg/l	0.2				
Issuance Date	6/30/75				
Expiration Date	8/14/80				
Compliance Date	8/14/75				

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
Gurney Manufacturing Prattville (I-37-01-012)	334.4	T17N/R16E/S33 NE1/4	32°27'40"	80°28'35"
	Autauga Creek (FW)		AL0000922	0.6

No treatment provided for process wastewater.

	Permit		Permit
Issuance Date	6/10/74	SS, lbs/day	150
Expiration Date	6/14/79	$S^=$, lbs/day	1.2
Compliance Date	1/1/77	Cr(t), lbs/day	0.6
pH, S.U.	6-9	Cr^{+6}, lbs/day	0.015
Temperature, °F	90	Fecal Coliform, No/100 ml	200
BOD_5, lbs/day	120		
Oil & Grease, mg/l (max)	15		
Phenols, lbs/day	0.6		

Table A-2.--Continued

<table>
<tr><th rowspan="2">Identification
(AWIC Inventory No.)</th><th>River Mile</th><th>Township/Range
Section/Quadrant</th><th>Latitude</th><th>Longitude</th></tr>
<tr><th colspan="2">Receiving Stream
(Water Use Classification)</th><th>NPDES
Permit No.</th><th>Flow (mgd)</th></tr>
<tr><td rowspan="3">Union Camp Corp.
Outfall 003
Prattville
(I-37-01-026)</td><td>330.6</td><td>T17N/R16E/S33
NW1/4</td><td>32°24'58"</td><td>86°27'47"</td></tr>
<tr><td colspan="2">Autauga Creek
(FW)</td><td>AL0003115</td><td>0.72</td></tr>
<tr><td colspan="4">No treatment is provided for cooling water.

Permit
Q, mgd
pH, S.U. — 6-9
Temperature, °F — 95
Issuance Date — 8/23/73
Expiration Date — 9/22/78
Compliance Date — 9/22/73</td></tr>
<tr><td rowspan="3">Union Camp Corp.
Outfall 002
Prattville
(I-37-01-026)</td><td>329.1</td><td>T17N/R16E/S33
SW1/4</td><td>32°24'10"</td><td>80°27'50"</td></tr>
<tr><td colspan="2">Alabama River
(SW)</td><td>AL0003115</td><td>1.3</td></tr>
<tr><td colspan="4">No treatment for cooling water. Part of discharge is recycled.

(Permit / Reported (11/75))
Q, mgd — / 0.13
pH, S.U. — 6-9 /
Temperature, °F — 95 / 89
Issuance Date — 8/23/73 /
Expiration Date — 9/22/78 /
Compliance Date — 9/22/73 /</td></tr>
<tr><td rowspan="3">American Oil Company
Montgomery
(I-37-51-004)</td><td>333.9</td><td>T16N/R17E/S17
SE1/4</td><td>32°21'30"</td><td>86°23'00"</td></tr>
<tr><td colspan="2">Tributary to Catoma Creek
(FWG)*</td><td>AL0003573</td><td>Runoff</td></tr>
<tr><td colspan="4">Runoff from tank loading area is treated by oil-water separator.

Permit
Issuance Date — 9/20/74
Expiration Date — 11/8/79
Compliance Date — 2/1/76
pH, S.U. — 6-9
Oil and Grease, mg/l (max) — 15</td></tr>
</table>

*Water Quality Limited Segment

Table A-2.--Continued

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Flow (cfs)
Texaco Montgomery (I-37-53-024)	333.6	T17N/R17E/S31 SW1/4	32° [illegible]'48"	86°24'20"
	Trib. to West End Ditch (FW)		AL00[illegible]1809	Runoff

Runoff is discharged untreated. State inventory lists receiving stream as Pintlala Creek.

	Permit
Issuance Date	9/20/74
Expiration Date	11/8/79
Compliance Date	2/1/76
pH, S.U.	6-9
Oil and Grease, mg/l (max)	15

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
Union Camp Corp. Outfall 001 Prattville (I-37-01-026)	325.3	T16N/R16E/S18 NE1/4	32°22'00"	86°29'10"
	Alabama River (SW)		AL0003115	18.3

Process wastewater is treated by sedimentation. Some sludge is recovered and reused with the remainder lagooned.

	Permit	Reported (1975) July	Aug	Sept.	Oct	Nov.
Q, mgd		25.8	37.9	24.4	26.2	20.7
pH, S.U.	6-9					
Temperature, °F	80	80	79	75	69	64
BOD_5, lbs/day	5600	2550	3060	2040	2290	2450
SS, lbs/day	8425	3815	3190	2620	2690	[illegible]75
Issuance Date	8/23/73					
Expiration Date	9/22/78					
Compliance Date	9/22/73					

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Flow (mgd)
Dan River Mills Benton (I-37-24-008)	288.3	T15N/R12E/S2 NE1/4	32°18'40"	86°49'36"
	Old Town Creek (FWG)		AL0001759	0.108

Sanitary and process wastewater are treated in a stabilization basin. Sludge is taken to a landfill.

	Permit	Reported (1975) Aug. Avg.	Aug. Max.	Sept. Avg.	Sept. Max.
Q, mgd		0.47	0.54	0.54	.55
pH, S.U.	6-9		9.0		8.[illegible]
Temperature, °F	94	89.8	98	80.3	92
BOD_5, lbs/day	12.6	5.6	6.8	8.2	14
SS, lbs/day	20	10.6	13.3	14	20.2
Settleable Solids, ml/l	0.1	<0.05		<0.05	
Fecal Coliform, No/100 ml	200			2.5	10
Issuance Date	[illegible]/25/74				
Expiration Date	12/31/78				
Compliance Date	9/30/74				

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
Transcontinental Gas Billingsley (I-37-11-025)	300.0	T20N/R13E/S25 S1/2	32°40'30"	8[illegible]°43'20"
	Daylight Creek (FWG)		AL0001732 (Draft)	0.5

Cooling water is recycled and reused. Cooling tower blowdown is discharged untreated.

	Permit	Reported (10/74 4/75) Min.	Avg.	Max.
Q, mgd		0.029	0.036	0.05
pH, S.U.	6-9			
Temperature, °F	95	63	75	87
Cr(t), mg/l	5.0	0	0.06	0.1[illegible]
[illegible](t), mg/l	1.0	0	0.2	0.6
[illegible]	0.2	0	0	0

AD-A131 664 WATER QUALITY MANAGEMENT STUDIES ALABAMA RIVER R E 'BOB' WOODRUFF WILLIAM..(U) GEOLOGICAL SURVEY OF ALABAMA UNIVERSITY MAR 83 DACW01-77-C-0140

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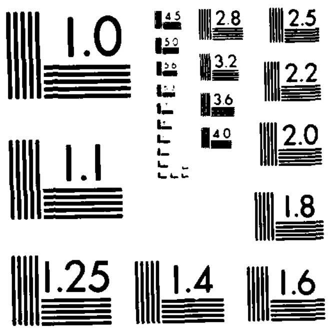

MICROCOPY RESOLUTION TEST CHART

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Table A-2.--Continued

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Flow (mgd)
Hammermill Paper Selma (I-37-24-013)	273.6	T17N/R12E/S33 NE1/4	32°24'50"	86°51'42"
	Alabama River (FW)		AL0003018	20.8

Process and sanitary wastes are treated in a sedimentation pond followed by a stabilization pond. Sludge to sludge lagoon. Part of wastes are recycled.

	Permit	Reported (1975) Nov. Avg.	Nov. Max.	Dec. Avg.	Dec. Max.
Q, mgd		17.1	24.0		11.0
pH, S.U.	6-9				7.5
Temperature, °F	105	62	72	55	68
BOD_5 (infl/effl), lbs/day	5775	32,365 / 4,328	50,865 / 7,932	23,691 / 5,964	37,843 / 9,580
SS (infl/effl), lbs/day	5250	32,477 / 4,532	90,492 / 10,662	31,329 / 3,498	99,898 / 7,200
Issuance Date	10/9/73				
Expiration Date	9/30/78				
Compliance Date	12/31/75				

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
Southland Mower Selma (I-37-24-023)	263.3	T16N/R11E/S17 NE1/4	32°22'05"	86°59'10"
	Tarver Creek (FW)		AL0002585	0.003

Process wastewater is treated in an equalization basin.

	Permit	Reported (1975) Aug. Avg.	Aug. Max.	Sept. Avg.	Sept. Max.
Q, mgd		0.0031	0.0034	0.0032	0.0034
pH, S.U.	6-9		7.8		
SS, lbs/day	.75	.08		0.2	
Issuance Date	9/10/74				
Expiration Date	10/25/79				
Compliance Date	10/25/74				

Table A-2.--Continued

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Flow (mgd)
General Battery Selma (I-37-24-010)	263.6	T16N/R11E/S17 NE1/4	32°22'05"	86°58'50"
	Alabama River (FW)		AL0025381	0.014
	No treatment on process wastewater.			
			Permit	
		Issuance Date	12/5/75	
		Expiration Date	1/9/81	
		Compliance Date	1/9/76	
		pH, S.U.	6-9	
		Temperature, °F	95	
		SS, mg/l	30	
		Cr(t), mg/l	0.5	
		Pb(t), mg/l	0.1	
		Zn(t), mg/l	0.8	
		Residual Chlorine, mg/l	0.2	
Cloverleaf Dairy Selma (I-37-24-007)	261.5	T16N/R11E/S7 NW1/4	32°23'19"	87°00'06"
	Alabama River (FW)		Draft	0.173
	No treatment provided for cooling and wash water.			
			Proposed Permit	
		BOD_5, mg/l	30	
		SS, mg/l	30	
Miller Plant No. 4 Selma (I-37-24-040)	262.6	T17N/R11E/S29	32°25'06"	86°59'43"
	Trib. to Beech Creek (FW)		AL0002372	0.04
	Process wastewater is discharged untreated.			
			Permit	
		Issuance Date	7/26/74	
		Expiration Date	7/26/79	
		Compliance Date	7/26/74	
		pH, S.U.	6-9	
		Temperature, °F	95	
		Oil & Grease, mg/l	15	
		Cr(t), mg/l	1.0	
		Zn(t), mg/l	0.5	

Table A-2.--Continued

Identification (AWIC Inventory No.)	River Mile	Township/Range Section/Quadrant	Latitude	Longitude
	Receiving Stream (Water Use Classification)		NPDES Permit No.	Flow (mgd)
Miller Plant No. 1 Selma (I-37-24-041)	258.8	T17N/R10E/S35 SE1/4	32°24'55"	87°02'06"
	Valley Creek (FW)		AL0002356	0.06
MacMillan-Bloedel Pine Hill (I-37-66-017)	176.2	T12N/R6E/S27	31°58'40"	87°27'58"
	Alabama River (FW)		AL0002674	14.0

Miller Plant No. 1:

Process wastewater is discharged untreated.

	Permit
Issuance Date	7/26/74
Expiration Date	7/26/79
Compliance Date	7/26/74
pH, S.U.	6-9
Temperature, °F	95
Oil and Grease, mg/l	15
Cr(t), mg/l	1.0
Zn(t), mg/l	0.5

MacMillan-Bloedel:

Process and sanitary wastewater. The treatment system includes equalization, sedimentation, flotation, stabilization, evaporation and incineration of liquid wastes, and reuse of water. Sludge is thickened, anaerobically digested, and lagooned.

		Reported (1975)			
		Nov.		Dec.	
	Permit	Avg.	Max.	Avg.	Max.
Q, mgd		13.6	14.2	10	14.2
pH, S.U.	6-9		8.4		8.6
Temperature, °F (max.)	86	62	74	53	62
BOD_5, lbs/day	6325	4647	7000	5994	7500
COD, lbs/day		22,250		17,860	
SS, lbs/day	6325	5497	7800	5455	8500
Issuance Date	9/23/73				
Expiration Date	9/22/78				
Compliance Date	10/23/73				

Table A-3.--Vertical profile data collected on the Alabama River

A. Station 8 (collected August 11, 1977)

	Left bank[a]	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen	9.2	9.7	10.9	9.5	9.0
(mg/1)	9.2	9.2	10.7	9.4	8.9
	9.3	9.3	10.8	9.6	
	9.4	9.3	10.0	9.9	
	9.2	9.5	10.0	9.3	
Temperature	29.5	29.5	29.5	29.5	29.5
(^{o}C)	29.5	29.5	29.5	29.5	29.5
	29.5	29.5	29.5	30.0	
	29.5	29.5	29.0	30.0	
	29.5	29.5	29.5	29.5	
Specific con-	112.0	112.0	119.0	116.0	120.0
ductance	112.0	112.0	115.0	115.0	118.0
(micromhos	112.0	111.0	114.0	114.0	
@ 25^{o}C)	112.0	111.0	114.0	114.0	
	112.0	112.0	105.0	112.0	
pH (units)	7.2	7.2	7.2	7.2	7.1
	7.1	7.3	7.1	7.2	7.3
	7.2	7.3	7.8	7.2	
	7.2	7.2	7.5	7.3	
	7.2	7.3	7.3	7.2	
Depth (in meters)	2	2	2	2	2
	4	4	4	4	4
	6	6	6	6	
	8	8	8	8	
	10	10	10	10	

a-Observations made looking downstream
Shallowest measurements indicate surface samples
Deepest measurements indicate bottom samples

Table A-3.--Continued.

B. Station 16 (collected August 16, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen (mg/l)	6.5	6.4	6.7	6.0	6.8
	6.5	6.0	6.3	6.0	5.2
	6.5	6.2	6.2	5.9	
	6.3	5.9	6.2	6.0	
		5.9	5.9	6.0	
Temperature (°C)	29.5	29.5	30.0	30.0	29.5
	29.5	29.5	30.0	30.0	29.0
	29.5	29.5	30.0	30.0	
	29.5	29.5	29.5	29.5	
		29.5	29.5	29.5	
Specific conductance (micromhos @ 25°C)	94.0	93.0	95.0	97.0	94.0
	92.0	92.0	92.0	92.0	92.0
	92.0	92.0	93.0	91.0	
	92.0	92.0	92.0	93.0	
		93.0	93.0	93.0	
pH (units)	7.4	6.5	6.8	6.8	7.1
	7.3	6.9	7.1	7.1	7.1
	7.3	7.0	7.3	7.0	
	7.2	7.1	7.2	7.1	
		7.1	7.1	7.1	
Depth (in meters)	0.3	4	4	4	0.3
	2	8	8	8	2
	4	12	12	12	
	7	16	16	16	
		20	20	18	

Table A-3.--Continued.

C. Station 17 (collected August 16, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen (mg/1)	9.2	8.4	8.1	7.7	7.7
	7.4	8.0	7.5	7.4	7.1
	7.0	7.1	7.0	7.3	7.1
		6.7	6.7	7.1	
		6.5	6.5	7.0	
		6.5	6.2		
Temperature (°C)	30.5	30.0	30.5	30.0	30.0
	30.0	30.0	30.0	30.0	30.0
	30.0	29.5	30.0	29.5	30.0
		29.5	29.5	29.5	
		29.5	29.5	29.5	
		29.5	29.0		
Specific conductance (micromhos @ 25°C)	90.0	91.0	92.0	92.0	93.0
	91.0	91.0	91.0	93.0	92.0
	90.0	91.0	93.0	90.0	90.0
		90.0	90.0	93.0	
		91.0	90.0	93.0	
		91.0	90.0		
pH (units)	6.7	6.4	6.4	7.1	7.0
	6.4	6.5	6.5	7.0	7.2
	6.4	6.5	7.0	6.9	7.2
		6.4	7.0	7.0	
		6.4	7.0	6.9	
		6.4	7.0		
Oxidation reduction potential (millivolts+)	195.0	220.0	160.0	170.0	160.0
	200.0	220.0	200.0	160.0	170.0
	190.0	220.0	200.0	170.0	165.0
		200.0	210.0	170.0	
		210.0	170.0	170.0	
		210.0	170.0		
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	2	2	2	2	2
	3	4	4	4	4
		6	6	6	
		8	8		
		11.6	12.2		

Table A-3.--Continued.

D. Station 21 (collected August 17, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen (mg/l)	9.3	9.0	9.1	9.4	10.0
	9.1	8.7	8.6	8.4	8.9
	8.6	8.4	8.3	8.2	8.5
					8.1
					7.9
Temperature (°C)	30.0	29.0	29.0	30.0	30.0
	30.0	29.0	29.0	29.5	29.5
	29.5	29.0	29.0	29.0	29.0
					29.0
					29.0
Specific conductance (micromhos @ 24°C)	98.0	99.0	102.0	104.0	101.0
	98.0	98.0	102.0	104.0	99.0
	98.0	98.0	102.0	104.0	97.0
					96.0
					100.0
pH (units)	7.8	7.1	7.5	7.0	7.0
	7.7	7.3	7.5	7.3	7.3
	7.6	7.4	7.5	7.4	7.5
					7.4
					7.6
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	2	2	2	2	2
	4	2.1	3	4	4
					6
					6.1

Table A-3.--Continued.

E. Station 32 (collected August 22, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen (mg/1)	8.1	8.6	7.3	8.5	8.6
	5.1	6.7	5.7	6.6	8.5
			5.4		
			5.2		
			5.1		
			5.1		
Temperature (°C)	29.0	29.0	29.0	29.0	28.0
	28.0	28.0	28.0	28.0	28.0
			28.0		
			28.0		
			28.0		
			28.0		
Specific conductance (micromhos @ 25°C)	138.0	134.0	132.0	130.0	139.0
	131.0	130.0	130.0	129.0	134.0
			134.0		
			130.0		
			131.0		
			132.0		
pH (units)	7.4	7.1	7.1	7.1	7.2
	7.3	7.4	7.2	7.2	7.6
			6.5		
			6.5		
			7.1		
			7.2		
Oxidation reduction potential (millivolts+)	150.0	180.0	170.0	165.0	173.0
	150.0	180.0	160.0	170.0	170.0
			160.0		
			180.0		
			165.0		
			130.0		
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	2	2	2	2	1
			4		
			6		
			8		
			16		

Table A-3.--Continued.

F. Station 33 (collected August 22, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen	8.0	8.0	8.0	7.8	7.8
(mg/1)	7.8	7.6	7.0	7.0	7.5
		7.2	6.9	6.8	6.9
		6.8	6.8	6.5	6.6
		6.4	6.4	6.4	
			6.2	6.2	
Temperature	27.0	27.0	27.0	27.0	27.0
(°C)	27.0	26.5	26.5	27.0	26.5
		26.0	26.5	26.5	26.5
		26.0	26.5	26.5	26.5
		25.5	26.0	26.5	
			26.0	26.0	
Specific conductance	123.0	134.0	133.0	135.0	133.0
(micromhos	131.0	132.0	131.0	131.0	129.0
@ 24°C)		129.0	132.0	129.0	128.0
		129.0	134.0	128.0	128.0
		128.0	132.0	127.0	
			130.0	128.0	
pH (units)	6.4	6.8	7.0	6.5	6.6
	6.4	7.2	7.1	7.1	7.0
		6.5	7.1	7.1	7.2
		7.1	7.1	7.1	7.1
		7.1	7.2	7.2	
			7.0	7.1	
Oxidation reduction potential	192.0	160.0	170.0	150.0	170.0
(millivolts+)	170.0	162.0	160.0	160.0	170.0
		170.0	167.0	162.0	170.0
		170.0	170.0	162.0	160.0
		173.0	165.0	160.0	
			205.0	160.0	
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	2	2	2	2	2
		4	4	4	4
		6	6	6	4.9
		6.9	8	8	
			15.5	14.6	

Table A-3.--Continued.

G. Station 34 (collected August 22, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen (mg/l)	8.1	8.0	7.8	8.1	8.0
	7.5	7.8	7.2	7.9	7.4
		7.3		7.8	
				7.5	
Temperature (°C)	29.5	29.5	29.5	29.5	29.5
	29.0	29.5	29.0	29.5	29.0
		29.0		29.5	
				29.0	
Specific conductance (micromhos @ 24°C)	130.0	131.0	132.0	134.0	131.0
	130.0	130.0	131.0	131.0	130.0
		131.0		132.0	
				131.0	
pH (units)	7.1	7.1	7.0	6.8	7.5
	7.2	7.2	7.1	7.3	7.7
		7.2		7.3	
				7.3	
Oxidation reduction potential (millivolts+)	190.0	190.0	190.0	190.0	180.0
	120.0	180.0	194.0	190.0	170.0
		142.0		180.0	
				180.0	
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	2	2	1	2	1
		4		4	
				4.9	

Table A-3.--Continued.

H. Station 37 (collected August 23, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen (mg/l)	8.0	8.3	8.6	8.5	8.4
	7.4	8.1	8.5	8.5	8.3
	6.0	7.9	8.2	8.4	
		6.5	7.8	7.9	
		6.0	6.0	6.4	
				5.9	
Temperature (°C)	28.5	29.0	29.0	29.0	29.0
	28.5	28.5	28.5	29.0	28.5
	29.0	29.0	28.5	29.0	
		29.0	28.5	28.5	
		28.5	28.5	29.0	
				28.5	
Specific conductance (micromhos @ 25°C)	128.0	128.0	121.0	121.0	121.0
	128.0	128.0	118.0	118.0	116.0
	114.0	128.0	119.0	120.0	
		128.0	118.0	119.0	
		128.0	119.0	118.0	
				119.0	
pH (units)	7.3	7.1	7.2	7.2	7.2
	7.4	7.3	7.4	7.1	7.0
	7.2	7.3	7.3	7.1	
		7.2	7.2	7.1	
		7.2	7.3	7.2	
				7.1	
Oxidation reduction potential (millivolts+)	110.0	130.0	190.0	145.0	185.0
	130.0	125.0	190.0	145.0	160.0
	130.0	85.0	130.0	230.0	
		95.0	135.0	210.0	
		80.0	140.0	270.0	
				260.0	
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	2	2	2	2	2
	4	4	4	4	
		6	6	6	
		6.4	7.6	8	
				9.1	

Table A-3.--Continued.

I. Station 43 (collected August 24, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen (mg/l)	8.4	8.7	8.5	8.0	8.0
	8.1	8.6	8.4	7.6	7.5
		8.5	8.4	7.4	
		8.0	8.0	7.0	
		7.0	7.4	6.8	
			7.0	6.4	
Temperature (°C)	30.0	30.0	30.0	30.0	30.0
	30.0	30.0	30.0	30.0	30.0
		30.0	30.0	30.0	
		30.0	30.0	30.0	
		30.0	30.0	30.0	
			30.0	30.0	
Specific conductance (micromhos @ 24°C)	133.0	131.0	127.0	131.0	132.0
	138.0	129.0	129.0	130.0	132.0
		130.0	126.0	130.0	
		128.0	126.0	130.0	
		128.0	129.0	129.0	
			129.0	130.0	
pH (units)	7.1	7.2	6.4	6.1	7.6
	7.0	7.1	6.6	6.2	7.6
		7.1	7.1	6.4	
		7.0	7.1	6.5	
		7.1	6.3	6.5	
			6.3	6.4	
Oxidation reduction potential (millivolts+)	190.0	200.0	189.0	240.0	210.0
	192.0	197.0	160.0	180.0	205.0
		200.0	160.0	170.0	
		190.0	175.0	120.0	
		190.0	175.0	140.0	
			175.0	120.0	
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	2	2	2	2	2
		4	4	4	
		5.0	6	6	
		5.9	8	8	
			9.1	8.5	

Table A-3.--Continued.

J. Station 17 (collected November 29, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen	10.6	11.0	11.2	11.0	10.7
(mg/l)	11.0	11.1	11.4	11.1	10.6
	11.0	11.1	11.4	11.1	
		11.1	11.3	11.2	
		11.0	11.4	11.2	
		11.0	11.3		
			11.3		
Temperature	10.0	9.0	8.0	8.0	8.0
(°C)	9.0	9.0	8.0	8.0	10.0
	9.0	8.0	8.0	8.0	
		8.0	8.0	8.0	
		8.0	8.0	8.0	
		8.0	8.0		
			8.0		
Specific conductance	102.0	99.0	100.0	99.0	104.0
(micromhos	101.0	96.0	95.0	97.0	102.0
@ 25°C)	101.0	97.0	96.0	98.0	
		97.0	95.0	99.0	
		98.0	96.0	99.0	
		98.0	96.0		
			95.0		
pH (units)	7.6	7.2	7.3	7.3	7.5
	7.4	7.3	7.5	7.3	7.5
	7.4	7.3	7.4	7.1	
		7.3	7.3	7.2	
		7.3	7.3	7.2	
		7.3	7.5		
			7.4		
Oxidation reduction potential	110.0	110.0	150.0	150.0	60.0+
(millivolts+)	110.0	120.0	150.0	150.0	60.0+
	110.0	110.0	140.0	150.0	
		110.0	140.0	140.0	
		110.0	70.0	140.0	
		110.0	80.0		
			90.0		
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	2	2	2	2	1.5
	2.7	4	4	4	
		6	6	6	
		8	8	6	
		14	10	9.1	
			15.9		

Table A-3.--Continued.

K. Station 33 (collected December 7, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen (mg/1)	12.4	11.2	12.2	11.4	11.7
	12.0	11.7	12.0	12.0	11.7
		11.2	11.8	11.4	
		11.2	11.7		
		11.2	11.7		
			11.6		
			11.6		
			11.4		
Temperature (°C)	5.0	7.0	6.0	7.0	6.5
	6.0	7.0	6.5	6.5	7.0
		7.0	7.0	6.5	
		7.0	7.0		
		7.0	6.5		
			6.5		
			6.5		
			6.5		
Specific conductance (micromhos @ 25°C)	98.0	114.0	100.0	118.0	112.0
	100.0	98.0	110.0	124.0	120.0
		117.0	110.0	104.0	
		98.0	118.0		
		100.0	110.0		
			101.0		
			101.0		
			100.0		
pH (units)	7.8	7.2	7.8	7.4	7.4
	7.7	7.3	7.7	7.4	7.5
		7.6	7.1	7.4	
		7.7	7.5		
		7.5	7.7		
			7.5		
			7.5		
			7.5		

Table A-3-K.--Continued.

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Oxidation reduction potential (millivolts+)	180.0	160.0	100.0	190.0	200.0
	190.0	230.0	220.0	200.0	190.0
		220.0	220.0	190.0	
		220.0	220.0		
		220.0	220.0		
			210.0		
			220.0		
			110.0		
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	1.5	2	2	2	3.7
		4	4	5.5	
		6	6		
		7.9	8		
			10		
			12		
			16.2		

Table A-3.--Continued.

L. Station 34 (collected December 7, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen (mg/l)	12.4	12.0	12.4	11.8	12.6
	12.2	11.8	12.0	11.8	12.4
		11.8		11.8	
				11.8	
				11.8	
Temperature (°C)	6.0	7.0	6.5	6.5	7.0
	6.0	7.0	7.0	7.0	7.0
		7.0		7.0	
				7.0	
				7.0	
Specific conductance (micromhos @ 25°C)	124.0	126.0	128.0	125.0	126.0
	123.0	126.0	127.0	126.0	127.0
		127.0		126.0	
				126.0	
				126.0	
pH (units)	7.4	7.4	6.9	7.6	7.5
	7.6	7.3	7.3	7.5	7.6
		7.3		7.5	
				8.0	
				7.9	
Oxidation reduction potential (millivolts+)	220.0	210.0	220.0	210.0	200.0
	210.0	210.0	220.0	190.0	200.0
		210.0		190.0	
				190.0	
				200.0	
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	0.9	2	3	2	0.9
		4.6		4	
				6	
				7.9	

Table A-3.--Continued.

M. Station 43 (collected December 8, 1977)

	Left bank	Left midstream	Midstream	Right midstream	Right bank
Dissolved oxygen	10.4	11.2	10.8	10.8	11.4
(mg/l)	10.6	10.6	10.7	10.7	11.0
		10.6	10.7	10.7	
		10.6	10.8	10.7	
		10.0	10.7	10.7	
		10.6			
Temperature	7.5	7.5	7.5	7.5	7.5
(°C)	7.5	7.5	7.5	7.5	7.5
		7.5	7.5	7.5	
		7.5	7.5	7.5	
		7.5	7.5	7.5	
		7.5			
Specific conductance	126.0	126.0	130.0	126.0	130.0
(micromhos	127.0	125.0	127.0	126.0	130.0
@ 25°C)		125.0	124.0	125.0	
		124.0	125.0	125.0	
		125.0	125.0	125.0	
		124.0			
pH (units)	7.4	7.4	7.4	7.4	7.3
	8.3	7.5	7.3	7.3	7.2
		7.5	7.5	7.4	
		7.5	7.4	7.4	
		7.9	7.5	7.4	
		7.8			
Oxidation reduction potential	190.0	210.0	240.0	220.0	210.0
(millivolts+)	210.0	205.0	235.0	220.0	190.0
		210.0	240.0	210.0	
		205.0	230.0	210.0	
		205.0	230.0	210.0	
		200.0			
Depth (in meters)	0.3	0.3	0.3	0.3	0.3
	1	2	2	2	1.1
		4	4	4	
		6	6	4	
		8	7.6	7.6	
		12.2			

Table A-4.--Biological data from the Alabama-Coosa River system for the period August 9 through December 8, 1977

Station number 1

STATION - 02411505 COOSA R NR MONTGOMERY ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770809				1.3	0.0	0.0	0.0	0.0	0	0	0	0
770919				0.6	3.3	0.7	1.1	0.9	0	1	2	0
771031				5.4	3.2	0.1	9.3	2.0	0	0	3	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770809				0	0			0	0	172	554	0
770919				0	0			0	0	191	611	57
771031				0	0	16	1	401	0	223	362	0

Station number 2

STATION - 02419965 COOSA R BELOW MURTARCR NR ELMORE ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770809				2.3	10.5	0.0	24.5	13.6	2	0	3	0
770919				0.0	0.1	0.1	0.3	0.0	0	0	1	0
771031				5.7	1.3	0.0	9.6	1.4	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770809				0	0			0	0	65	243	0
770919				0	0			0	0	306	242	0
771031				0	0	16	0	0	19	1751	408	0

Station number 3

STATION - 02419980 ALA R AT COOSADA FERRY NR MONT. ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770809				2.9	21.8	0.0	16.3	15.6	0	0	2	0
770919				0.6	2.8	1.6	0.5	0.4	0	0	6	0
771031				1.6	2.3	0.3	5.8	1.4	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770809				0	0			0	0	101	846	0
770919				0	0			0	0	140	420	210
771031				0	0	9	[illegible]	19	13	263	134	0

Table A-4.--Continued

Station number 4

STATION - 02419983 ALA R NR CHISOLM ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER/ /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCUCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770809				1.3	9.7	0.0	13.4	3.1	0	0	2	0
770920				0.6	1.8	2.3	2.3	2.1	0	0	0	0
771031				0.6	4.0	1.1	3.7	1.4	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770809				0	0			0	0	129	130	0
770920				0	0			0	0	57	25	210
771031				0	0	39.5	3.4	19	0	2177	67	0

Station number 5

STATION - 02419986 ALA R AT L&N RR NR MILLBROOK ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCUCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770809				39.4	15.4	0.0	14.8	3.6	0	0	1	0
770920				5.1	1.5	2.0	1.7	0.5	0	0	2	0
771101				0.6	1.2	0.6	4.0	0.3	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770809				0	0			0	0	86	574	0
770920				0	0			19	0	64	834	162
771101				0	0	13	4	0	19	124	57	0

Station number 6

STATION - 02419987 ALA R AT HWY 143 NR MONTGOMERY ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCUCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770811				2.3	19.1	0.0	19.7	13.6	0	0	4	0
770920				0.6	5.1	1.1	5.3	4.0	0	0	2	0
771101				3.2	2.8	2.0	11.1	2.1	0	0	3	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770811				0	0			0	0	115	301	0
770920				0	0			0	[illegible]	64	127	287
771101				0	0	7	3	0	19	38	277	0

Table A-4.--Continued

Station number 7

STATION - 02419989 ALA R NR MAXWELL AFB NR MONT. ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770811				399.6	16.1	0.0	11.8	11.0	0	0	5	0
770920				157.9	2.6	0.6	3.3	2.7	0	0	2	0
771101				0.0	1.2	0.1	4.6	1.7	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770811				0	0			0	0	129	158	0
770920				0	0			19	0	369	261	516
771101				0	0	14	1	45	19	191	0	0

Station number 8

STATION - 02420045 ALA R NR PRATTVILLE ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770811				366.4	28.3	0.0	37.6	17.4	0	0	4	0
770920				2076.0	1.0	0.3	2.3	1.2	0	0	0	0
771101				0.6	3.1	0.0	5.1	1.2	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770811				0	0			0	0	86	272	0
770920				0	0			0	0	127	395	0
771101				0	0	8	0	0	0	516	96	0

Station number 9

STATION - 02420600 ALA R BELOW AUTAUGA CR NR PRATVL ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770812				2557.5	49.7	0.0	91.3	18.2	0	0	3	0
770921				1785.0	[illegible]	1.6	1.0	1.5	0	0	0	0
771101				6.4	2.3	0.1	6.2	0.4	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770812				0	0			0	0	143	329	0
770921				0	0			0	0	57	541	[illegible]
771101				0	0	13	0	[illegible]	[illegible]	146	344	0

Table A-4 --Continued

Station number 10

STATION - 02421060 ALA R BELOW CATOMA CR NR PRATVL ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCUCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770812				[illegible]	26.2	0.0	[illegible]	[illegible]	0	0	1	0
770921				958.2	2.5	0.1	3.6	[illegible]	0	0	0.6	0
771101				3.6	5.5	0.3	2.9	[illegible]	0	0	0.6	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770812				0	0			0	43	287	1332	0
770921				0	0			0	19	166	166	191
771101				0	0	9	1	0	57	312	430	0

Station number 11

STATION - 02421090 ALA R AB PINTOLLA CR NR PRATTVIL ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCUCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770812				7413.7	27.1	0.0	45.2	14.0	0	0	1	0
770921				318.3	[illegible]	3.1	4.1	4.7	0	0	2	0
771102				732.2	1.2	0.0	4.1	0.3	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770812				0	0			129	0	244	2106	0
770921				0	0			0	0	297	449	0
771102				0	0	5	0	19	0	172	306	0

Station number 12

STATION - 02421195 ALA R NR BURKVILLE ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC /SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCUCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770812				482.9	34.6	0.0	30.1	8.1	0	0	1	0
770921				2101.0	4.0	3.8	3.7	5.9	[illegible]	[illegible]	3	0
771102				445.7	0.4	0.0	1.2	0.2	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770812				0	0			[illegible]	0	[illegible]	129	0
770921				0	0			0	38	433	439	[illegible]
771102				0	0	2	2	0	0	306	159	0

Table A-4.--Continued.

Station number 13

STATION - 02421220 ALA R BELOW ROCKY BR NR LOWNDS60 ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770812				1312.2	15.3	0.0	48.9	6.6	0	0	0	0
770921				764.0	1.1	1.4	2.2	1.1	0	0	0.5	0
771102				859.5	1.4	0.0	2.3	0.6	0	1	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONULS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770812				0	0			0	0	43	502	0
770921				0	0			0	0	102	369	134
771102				0	0	3	1	29	0	152	38	0

Station number 14

STATION - 02421290 ALA R BELOW BEAVER CR NR AUTAUGA ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770816				4.3	29.1	0.0	55.8	3.4	0	0	0	0
770922				159.2	0.1	0.4	0.5	10.0	0	0	0	0
771103				70.0	1.4	0.0	1.6	1.2	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONULS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770816				0	0			0	0	115	1490	0
770922				0	0			19	0	67	51	255
771103				0	0	11	2	0	96	242	38	0

Station number 15

STATION - 02421315 ALA R BELOW IVY CR NR MULBERRY ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770816				386.8	62.8	0.0	60.0	31.9	0	0	1	0
770922				986.8	1.3	0.5	9.5	2.9	0	0	1	0
771103				70.7	0.5	0.6	2.0	1.0	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONULS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770816				0	0			0	0	129	401	0
770922				0	0			0	0	197	420	57
771103				0	0	13	7	19	57	236	57	0

Table A-4--Continued.

Station number 16

STATION - 02421325 ALA R AT DAYS BEND NR BENTON ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770816				573.1	27.5	0.0	55.3	13.5	0	0	0	0
770922				1.9	0.9	0.5	2.6	2.1	0	0	0	0
771103				178.9	0.5	0.0	1.7	1.1	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770816				0	0			0	122	115	443	0
770922				0	0			0	0	96	127	497
771103				0	0	1	0	0	19	143	331	0

Station number 17

STATION - 02421349 ALA R JONES BLUFF NR BENTON ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770816				945.5	9.0	0.0	9.7	6.6	0	0	0	0
770922				1990.0	0.5	0.3	3.6	2.1	0	0	0	0
771103				578.7	0.4	0.0	2.1	3.5	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770816				0	0			0	43	215	473	0
770922				0	0			0	19	96	258	153
771103				0	0	5	5	19	19	210	108	0

Station number 18

STATION - 02421355 ALA RIVER NR BENTON ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770816				44.3	10.7	0.0	46.4	16.4	0	0	1	0
770922				509.3	1.3	0.1	9.1	7.0	0	0	0	0
771103				16.5	0.2	0.1	1.6	1.1	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CURBI NO/M2	75027 HEXAGE NO/M2
770816				0	0			0	0	0	390	0
770922				0	0			0	0	95	324	0
771103				0	0	3	2	0	0	32	71	0

Table A-5.--(continued)

Station number 19

STATION - 02422170 ALA R NR STATESVILLE ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770817				1.3	10.1	0.7	16.	3.5	0	0	0	0
770926				5.1	9.3	2.4	17.1	20.7	0	0	23	0
771107				0.6	4.6	[illegible]	7.6	4.8	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770817				0	0			0	0	301	215	0
770926				0	0			0	0	0	382	0
771107				0	0	8	1	0	0	38	32	0

Station number 20

STATION - 02422625 ALA R BELOW MULBERY CR NR BURNSV ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770817				2.3	30.0	0.0	14.8	15.8	0	0	1	0
770926				1.9	3.5	1.3	4.1	3.2	0	0	3	0
771107				0.6	1.8	0.1	1.2	1.4	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770817				0	0			43	41	[illegible]	14-	0
770926				0	0			0	39	17[illegible]	[illegible]08	0
771107				0	0	6	1	0	19	83	13	0

Station number 21

STATION - 02422650 ALA R NR MANILA ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770817				[illegible]	109.9	[illegible]	17.7	[illegible]	0	[illegible]	4	
770926				5.7	[illegible]	[illegible]	1.2	[illegible]	0	0		[illegible]
771107				0.6	3.2	0.[illegible]	[illegible]	3.[illegible]	0	[illegible]	[illegible]	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770817				0	0			[illegible]	[illegible]	[illegible]74	45[illegible]	[illegible]
770926				0	0			0	[illegible]	38	251	[illegible]
771107				0	0	1	1	0	0	[illegible]	[illegible]	0

Table A-4.--Continued

Station number 22

STATION - 02422765 ALA R NR CRAIG AFB NR SELMA ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770817				1.3	19.6	0.0	20.8	24.1	0	0	1.3	0
770926				2.5	12.9	5.8	12.6	12.9	0	0	62.5	0
771107				10.8	2.7	0.1	3.2	2.2	0	0	1.4	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75016 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770817				0	0			43	0	86	258	0
770926				0	0			19	0	86	38	0
771107				0	0	3	1	0	6	0	38	0

Station number 23

STATION - 02423000 ALA R AT SELMA ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770817				34.4	17.3	0.0	28.3	5.8	0	0	4	0
770926				2.5	2.4	3.6	3.2	0.1	0	0	7.9	4
771108				0.6	3.4	0.3	5.3	6.2	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770817				0	0			0	0	86	525	0
770926				0	0			0	0	57	153	57
771108				0	0	5	13	0	19	134	38	0

Station number 24

STATION - 02423050 ALA R NR SELMA ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770818				5.6	25.8	0.8	19.1	[illegible]	0	0	2.2	1
770927				312.1	3.2	1.0	12.8	[illegible]	0	0	3.1	0
771108				0.6	2.6	[illegible]	3.6	1.0	0	0	0.5	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770818				0	0			0	0	67	1690	0
770927				0	0			0	19	124	649	0
771108				0	0	3	1	0	0	19	220	0

STATION [illegible] ALA R AB CAHABA R NR CAHABA ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770816				[illegible]	33.4	[illegible]	13.3	7.9	0	0	3	0
770927				259.6	4.7	0.5	24.6	2.6	0	0	3	0
771108				63.0	1.7	1.4	3.[illegible]	2.4	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAL NO/LITER	71395 ORD CHRY SOMONULS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770816				0	0			0	65	300	3152	395
770927				0	0			19	0	127	204	280
771108				0	0	1	1	0	19	51	159	293

STATION - 02425115 ALA R NR CAHABA ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770816				8.5	23.2	0.2	44.7	11.2	0	0	2	0
770927				207.6	4.8	0.4	9.4	28.5	0	0	4	0
771108				62.4	3.7	1.4	2.3	1.8	0	0	3	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAL NO/LITER	71395 ORD CHRY SOMONULS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770816				0	0			0	0	14[illegible]	946	[illegible]
770927				0	0			19	0	57	[illegible]	[illegible]
771108				0	0	6	5	19	0	19	76	0

STATION [illegible] ALA R AB [illegible] NR [illegible] ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
[illegible]				7.[illegible]	4.6	[illegible]	20.4	15.5	0	0	[illegible]	[illegible]
[illegible]				[illegible]	[illegible]	[illegible]	26.7	7.2	0	[illegible]	[illegible]	[illegible]
[illegible]				[illegible]	[illegible]	1.[illegible]	5.9	4.1	0	[illegible]	[illegible]	[illegible]

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAL NO/LITER	71395 ORD CHRY SOMONULS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
[illegible]								[illegible]	[illegible]	120	174	[illegible]
[illegible]					[illegible]			0	[illegible]	76	[illegible]	[illegible]
[illegible]						[illegible]	10	0	[illegible]	96	[illegible]	[illegible]

Station number 8

STATION - 02425700 ALA R NR ELM BLUFF ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770819				227.7	3.9	0.4	6.0	9.8	0	0	2	1
770927				827.7	2.7	1.0	3.0	1.0	0	0	3	0
771109				180.8	5.6	[illegible]	1.1	3.5	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770819				0	0			107	0	258	487	0
770927				0	0			19	19	325	166	[illegible]
771109				0	0	26	7	0	0	57	102	0

Station number 9

STATION - 02425800 ALA R AB BOGUECHITTO CREEK ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770819				245.0	5.4	0.2	19.3	14.7	0	0	3	0
770927				19.7	3.9	0.1	14.2	1.7	0	0	35	0
771109				1.0	3.1	1.0	5.0	2.2	0	0	3	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770819				0	0			0	43	344	702	0
770927				0	0			19	19	76	108	0
771109				0	0	5	4	19	38	344	509	0

Station number 10

STATION - 02427400 ALA R NR CAMDEN ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
[illegible]				101.7	9.3	0.1	11.5	11.4	0	0	7	0
770928				372.5	31.6	0.2	24.7	[illegible]	0	0	62	0
771110				85.0	1.0	0.6	1.9	1.6	0	0	2	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
[illegible]				0	0			65	119	516	516	0
770928				0	0			76	19	666	555	0
771110				0	0	16	3	3?	[illegible]	70	[illegible]	0

STATION - [illegible] [illegible] ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71374 ORD-EUGL ENALES NO/LITER
770822				[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	0	0	[illegible]	0
770928				159.4	29.1	[illegible]	[illegible]	[illegible]	0	0	35	0
771114				136.4	[illegible]	0.0	[illegible]	[illegible]	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770822				0	0			43	86	344	788	[illegible]
770928				0	0			0	36	96	159	[illegible]
771114				0	0	23	2	38	64	478	140	[illegible]

Station number 32

STATION - 02427500 ALA R NR MILLERS FERRY ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71374 ORD-EUGL ENALES NO/LITER
770822				1.3	5.1	0.3	9.6	10.9	0	0	4	1
770928				255.3	44.1	0.5	33.9	6.1	0	0	26	0
771114				52.4	0.9	0.1	0.9	1.4	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770822				0	0			0	129	430	[illegible]	
770928				0	0			0	29	204	344	[illegible]
771114				0	0	24	6	0	[illegible]	248	[illegible]	

Station number 33

STATION - 02427504 ALA R MILLERS FERRY NR CAMDEN ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71374 ORD-EUGL ENALES NO/LITER
770822				193.1	5.1	0.0	8.5	9.5	0	1	[illegible]	[illegible]
770928				210.1	157.4	0.0	114.5	81.8	0	0	37	
771114				154.1	[illegible]	0.1	[illegible]	[illegible]	0	0	0	[illegible]

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770822				0	0			[illegible]	[illegible]	[illegible]		
770928				0	0			0	[illegible]	229	781	[illegible]
771114				0	0	[illegible]	[illegible]	152	0	726	[illegible]	

Table A-4.--Continued

Station number 35

STATION - 02427507 ALA R AB POWERHOUSE AT MILLERS F ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770822				233.5	3.8	0.0	11.5	8.3	0	0	1	0
770929				514.4	123.9	0.0	91.1	113.7	0	0	21	0
771114				252.8	0.0	0.0	0.4	2.0	0	0	2	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770822				0	0			43	0	229	1447	0
770929				0	0			0	19	261	1337	6
771114				0	0	22	0	38	0	325	528	0

Station number 35

STATION - 02427511 ALA R NR MIDWAY ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770822				34.4	12	0.2	18.2	16.2	0	0	1.8	0
770929				11.0	27.9	1.1	31.4	7.0	0	0	23	0
771115				1.0	0.5	0.0	1.2	1.5	0	0	0.6	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770822				0	0			150	0	408	3223	0
770929				0	0			0	19	64	713	19
771115				0	0	6	2	0	0	57	38	0

Station number 36

STATION - 02427745 ALA R NR YELLOW BLUFF ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770823				153.0	0.3	0.3	8.0	13.0	0	0	1	0
770929				242.0	30.3	0.8	105.8	55.9	0	0	97	0
771115				0.0	2.1	0.2	1.5	2.7	0	0	2	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770823				0	0			0	0	86	638	0
770929				0	0			19	48	200	1362	83
771115				0	0	30	3	0	0	29	0	0

STATION - 0242820[illegible] ALABAMA RIVER AT LOWER PEACH TREE ALABAMA RIVER

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLOR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770823				91.8	3.4	1.4	15.7	3.1	0	0	6	0
771003				[illegible]	12.5	0.3	9.6	4.0	0	0	3	0
771115				35.0	0.5	0.1	0.2	0.2	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770823				0	0			0	86	193	9813	0
771003				0	0			0	19	105	1700	0
771115				0	0	9	0	0	57	449	312	0

Station number 38

STATION - 02428335 ALA R ABOVE MCLEOD CR NR FRANKLIN ALABAMA RIVER

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLOR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770824				83.0	0.2	0.0	9.4	2.2	0	0	1	0
771003				32.0	3.7	0.2	7.6	6.1	0	0	1	0
771116				117.0	0.6	0.1	0.9	1.3	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770824				0	0			0	86	129	[illegible]	0
771003				0	0			0	76	48	[illegible]	0
771116				0	0	22	1	0	0	153	[illegible]	0

Station number [illegible]

STATION - 02428345 ALA R AT DAVIS FERRY NR FRANKLIN ALABAMA RIVER

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLOR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770824				478.0	0	0.0	14.9	3.0	0	0	1	0
771003				216.0	9	0.5	12.7	18.7	0	[illegible]	3	0
771116				221.0	0.6	0.1	0.1	1.2	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770824				0	0			0	[illegible]	[illegible]	[illegible]	0
771003				0	0			19	[illegible]	25	[illegible]	0
771116				0	0	10	[illegible]	0	[illegible]	210	[illegible]	0

Table A-4 --Continued

Station number 40

STATION - 02428380 ALA R BELOW CANE CREEK NR CHANCE ALABAMA RIVER

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770824				128.9	2.2	0.0	10.8	6.4	0	0	1	0
771003				115.0	4.7	0.1	14.7	14.2	0	0	3	0
771116				13.0	0.5	0.2	0.3	0.4	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONULS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770824				0	0			0	43	372	2522	0
771003				0	0			29	38	64	468	0
771116				0	0	22	0	0	0	200	105	0

Station number 41

STATION - 02428395 SILVER CR NR FINCHBURG ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770824				4.3	132.2	3.1	6.7	8.1	0	0	10	0
771003				0.6	118.2	7.1	7.5	4.1	0	0	6	0
771116				198.6	85.0	9.1	0.0	12.8	0	0	3	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONULS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770824				0	0			0	171	931	72	0
771003				0	0			0	0	140	19	0
771116				0	0	114	2	0	248	89	67	0

Station number [illegible]

STATION - 02428396 ALA R BELOW SILVER CR NR FINCHBG ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770824				73.[illegible]	9.8	0.2	[illegible]	[illegible]	0	0	3	0
771004				350.2	3.1	0.3	4.3	[illegible]	0	0	1	0
771116				15.3	1.0	0.0	0.4	[illegible]	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONULS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770824				0	0			0	0	559	1433	0
771004				0	0			0	96	312	609	0
771116				0	0	[illegible]	1	[illegible]	0	114	127	0

STATION - [illegible] ALA R [illegible] ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770824				[illegible]	[illegible]	0.1	9.3	4.0	0	0	0	0
771004				6.6	[illegible]	0.0	6.6	47	0	0	2	0
771116				1.4	[illegible]	0.3	0.8	0.4	0	0	1	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770824				0	0			0	96	279	645	0
771004				0	0			0	19	127	19	[illegible]
771116				0	0	15	1	0	0	172	70	[illegible]

STATION - 02428405 ALA R 0.4 MI. BELOW CLAIBORNE LD ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770824				42.3	8.0	0.0	16.0	7.5	0	0	2	0
771004				0.6	3.0	0.2	7.3	9.6	0	0	2	0
771117				5.1	0.3	0.0	0.5	0.5	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770824				0	0			0	0	96	373	0
771004				0	0			13	0	115	[illegible]	0
771117				0	0	3	0	0	0	57	[illegible]	0

STATION - 02429500 ALA R AT CLAIBORNE ALABAM RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770825				[illegible]	2.4	0.0	21.3	7.1	0	0	0	[illegible]
771004				1.4	1.1	0.0	[illegible]	3.9	0	0	1	0
771117				1.3	[illegible]	0.0	[illegible]	0.5	0	[illegible]	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770825				0	0			[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
771004				0	0			76	[illegible]	[illegible]	[illegible]	0
771117				0	0	2	0	0	0	0	36	0

Table A-4.--Continued

Station number 46

STATION - 02429506 ALA R AT CEDAR CR NR GOSPORT ALABAMA RIVER BASIN

DATE	TIME	DATE	TIME	00571 BIOMASS BENTHIC G/SQ M	60990 ZOOPLANK OTHER /LITER	71261 PHYLUM PROTOZOA NO/LITER	71291 O CLAD-OCERA NO/LITER	71297 ORDER COPEPODA NO/LITER	71311 ORD-ULOT RICHALES NO/LITER	71320 ORD-CLAD OPHORALE NO/LITER	71322 ORD CHLR OCOCCALE NO/LITER	71379 ORD-EUGL ENALES NO/LITER
770825				24.3	2.2	0.0	8.3	4.2	0	0	2	0
771004				0.6	1.1	0.2	4.9	5.3	0	0	1	0
771117				7.0	0.5	0.1	0.1	0.4	0	0	0	0

DATE	TIME	DATE	TIME	71383 ORD-DINO KONTAE NO/LITER	71395 ORD CHRY SOMONDLS NO/LITER	71401 ORD CEN-TRALES NO/LITER	71408 ORD PEN-NALES NO/LITER	75009 CADDIS NO/M2	75018 CHAOBO NO/M2	75021 CHIRON NO/M2	75024 CORBI NO/M2	75027 HEXAGE NO/M2
770825				0	0			0	86	65	330	0
771004				0	0			0	19	0	19	0
771117				0	0	3	1	19	0	19	38	0

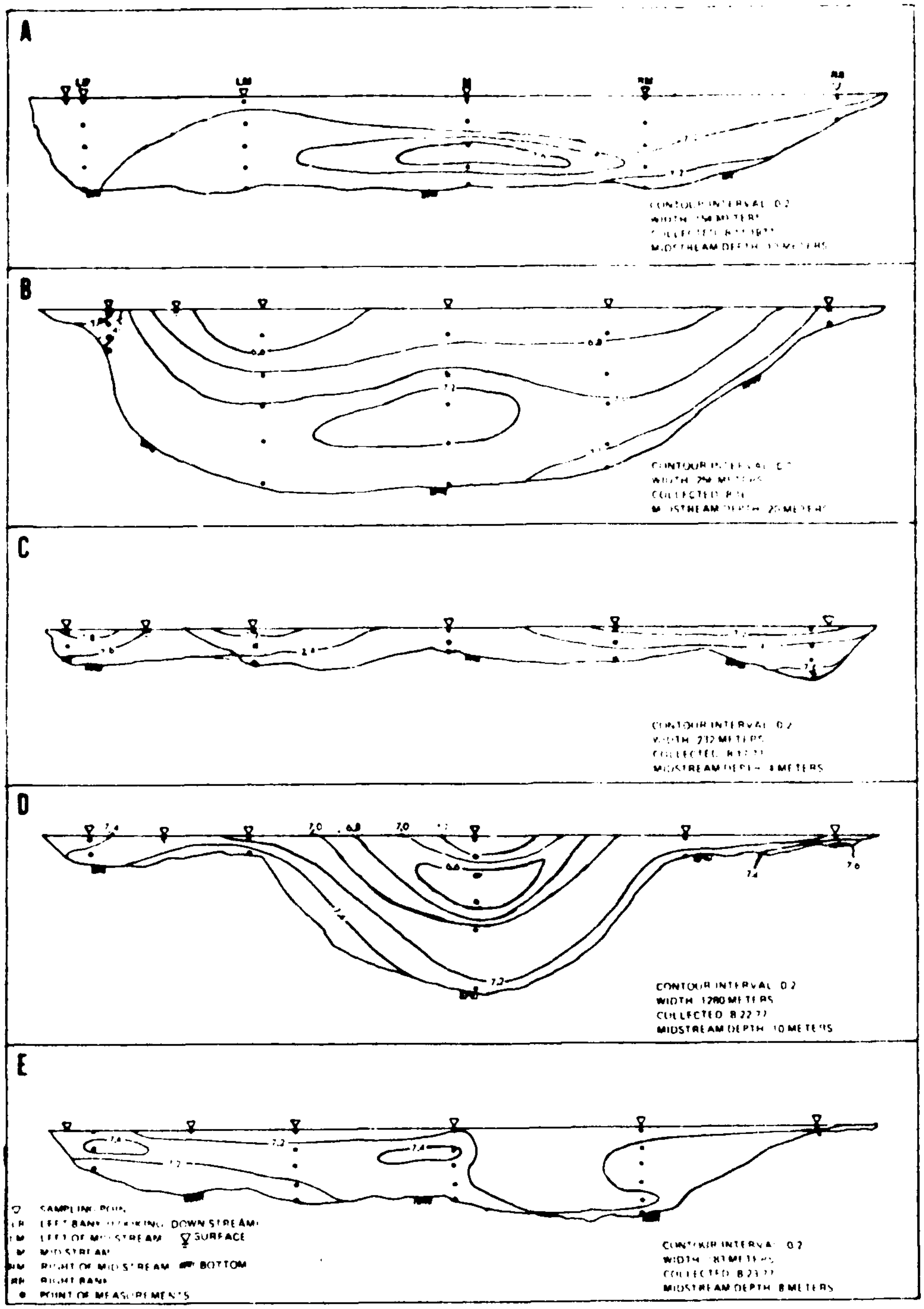

Figure A-1.--Isopleths of pH, specific conductance, temperature, and dissolved oxygen concentrations at station 8 during August 1977.

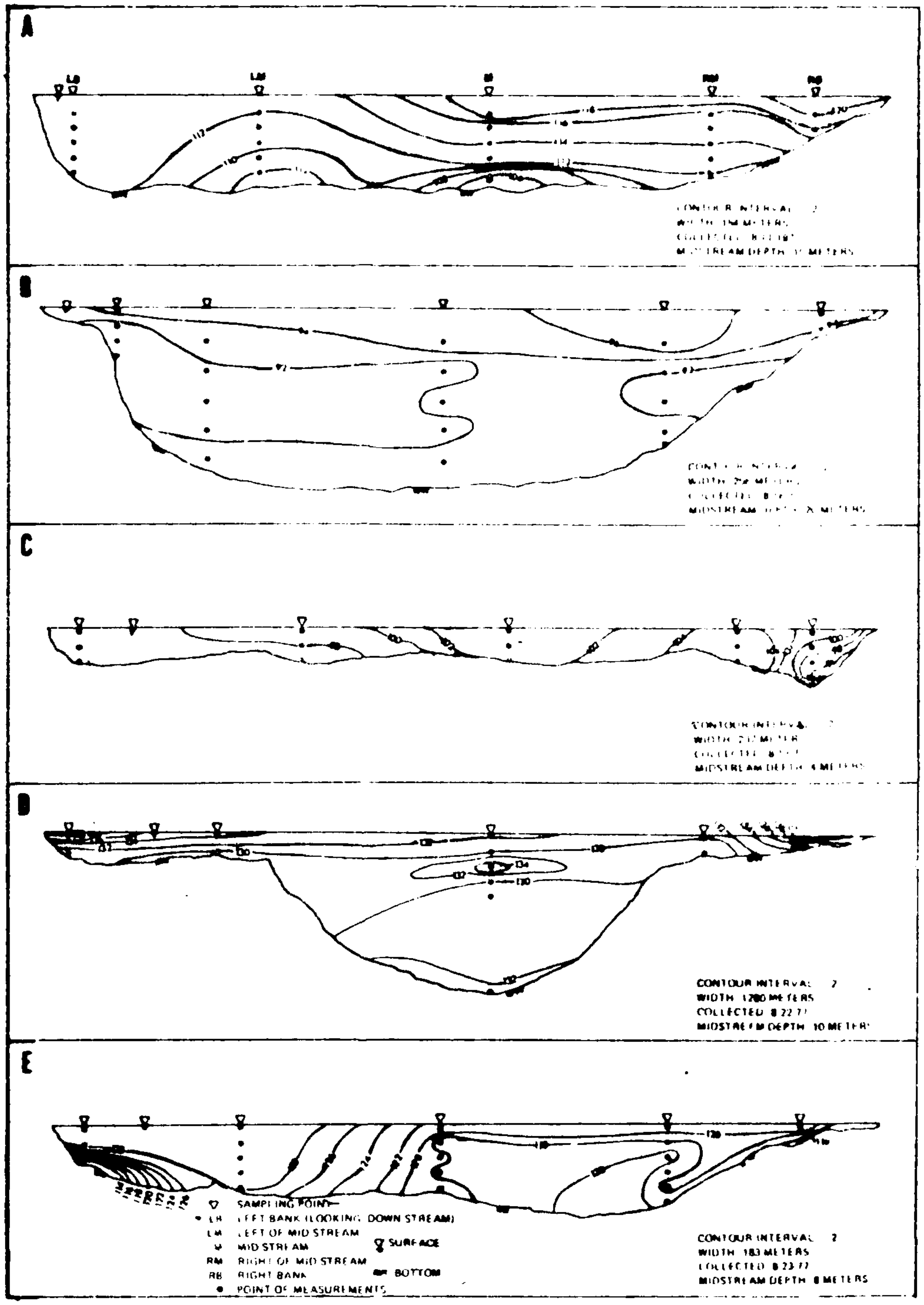

Figure A-2.--Isopleths of pH, specific conductance, temperature, and dissolved oxygen concentrations at station 16 during August 1977.

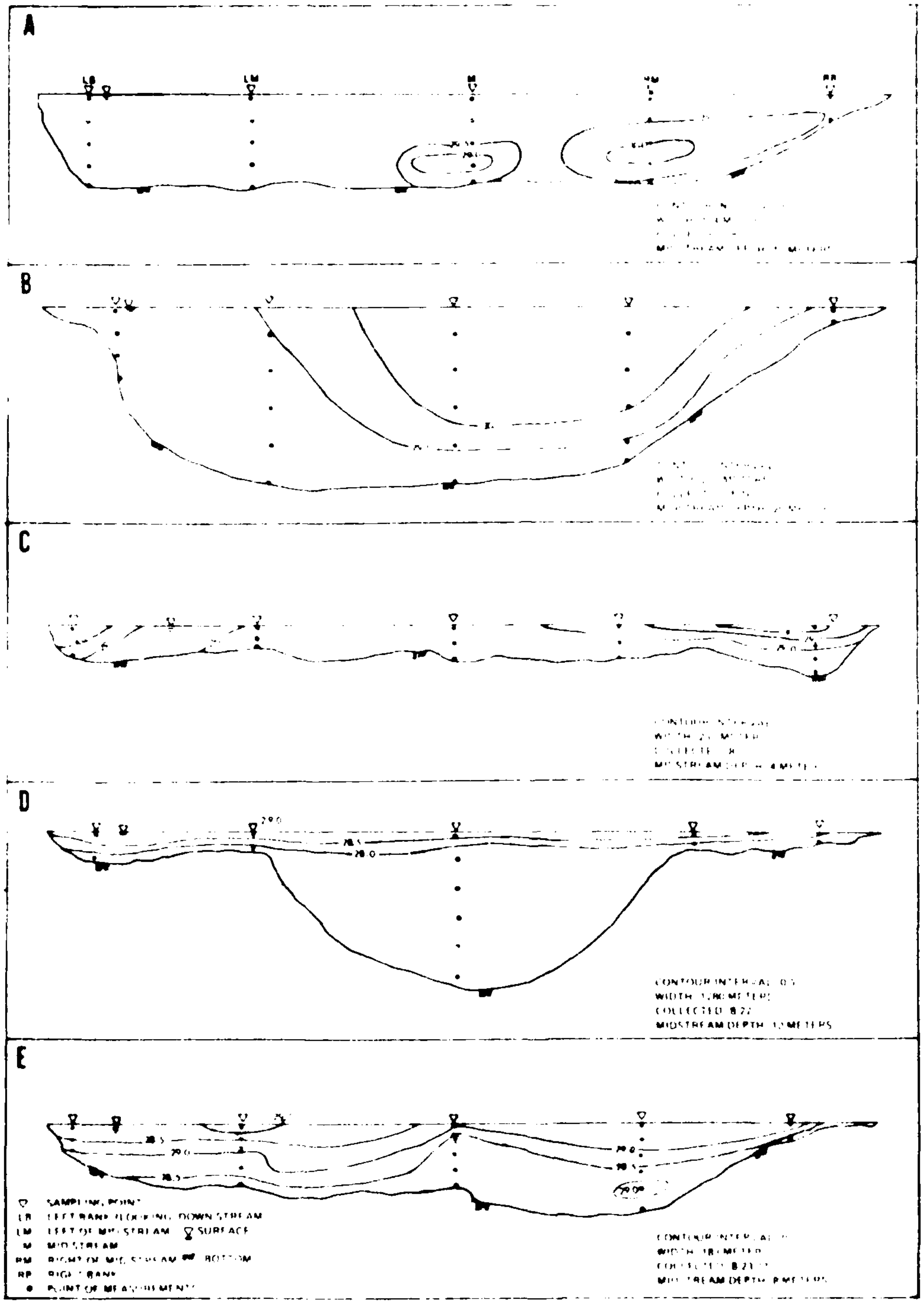

Figure A-3.--Isopleths of pH, specific conductance, temperature, dissolved oxygen concentrations, and oxidation reduction potential at station 17 during August 1977.

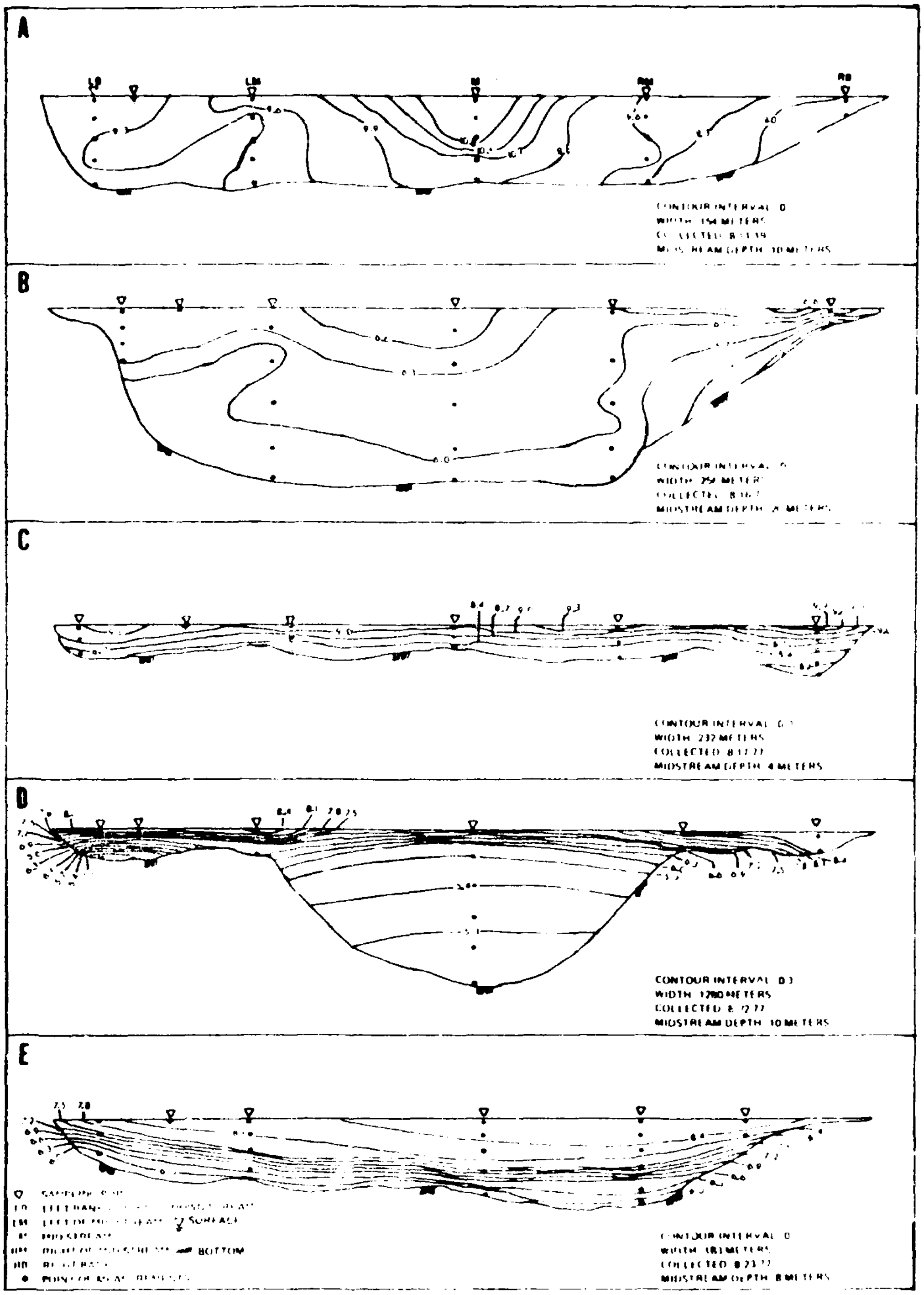

Figure A-4.--Isopleths of pH, specific conductance, temperature, and dissolved oxygen concentrations at station 21 during August 1977.

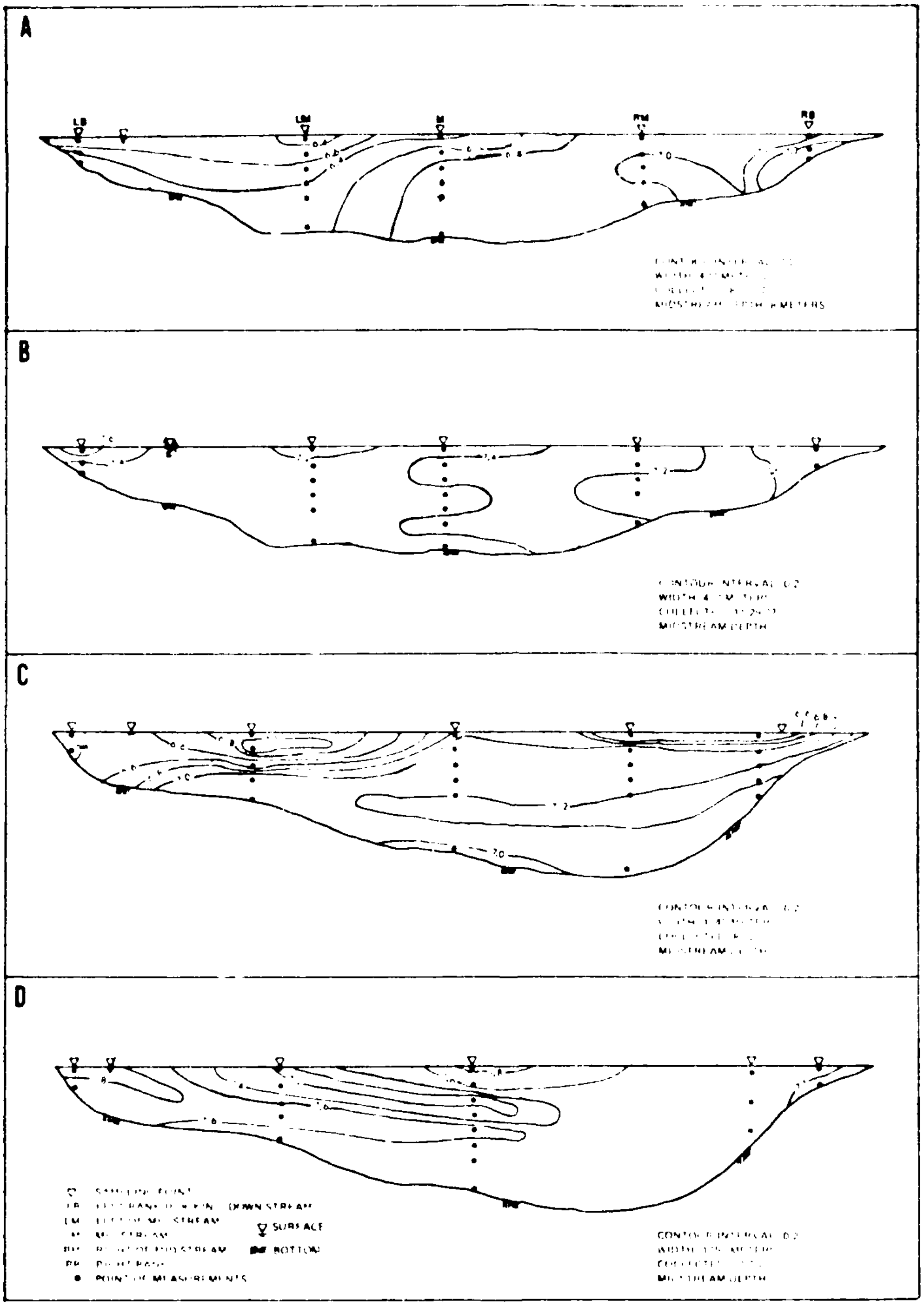

Figure A-5.--Isopleths of pH, specific conductance, temperature, and dissolved oxygen concentrations at station 32 during August 1977.

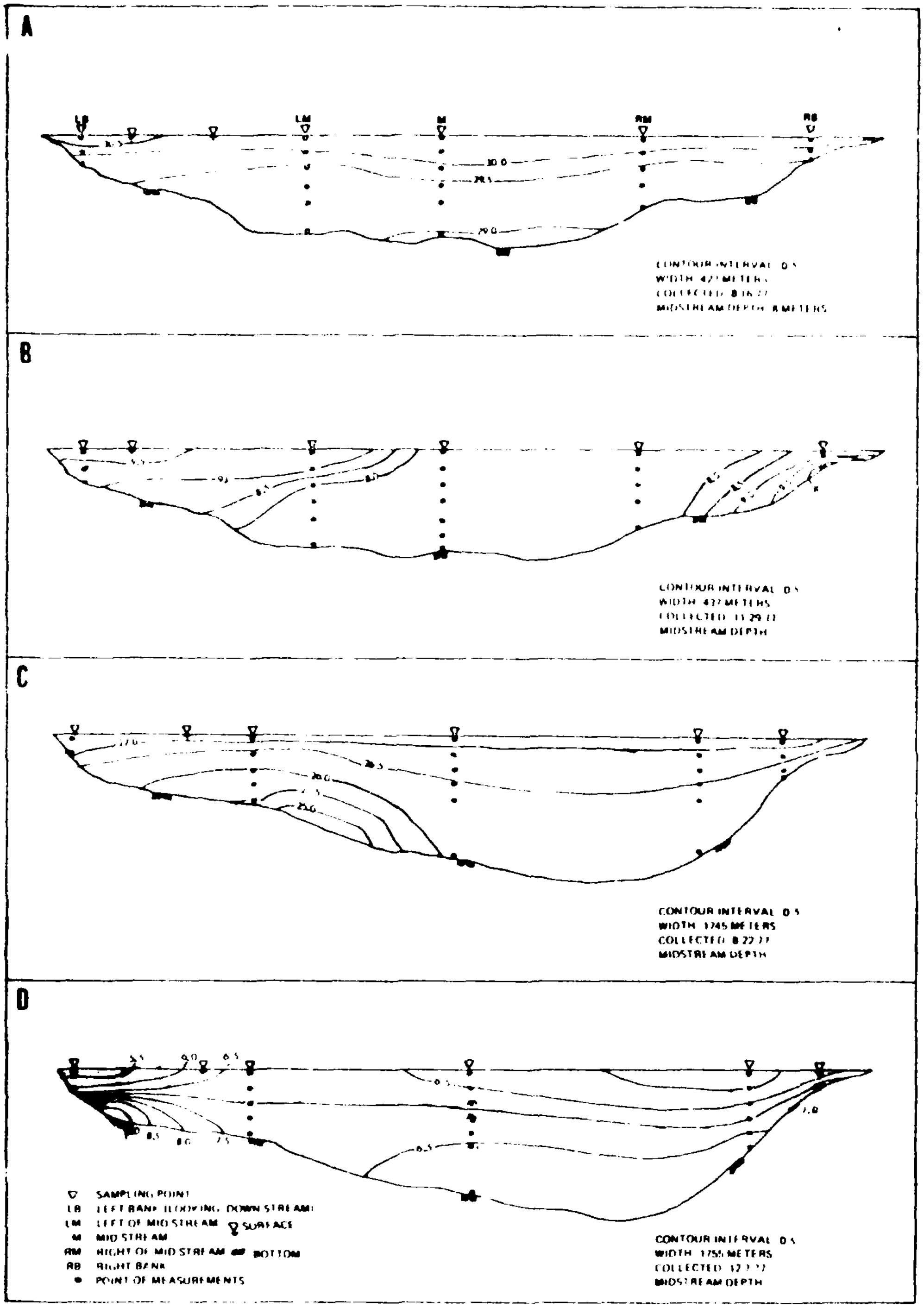

Figure A-6.--Isopleths of pH, specific conductance, temperature, dissolved oxygen concentrations, and oxidation reduction potential at station 33 during August 1977.

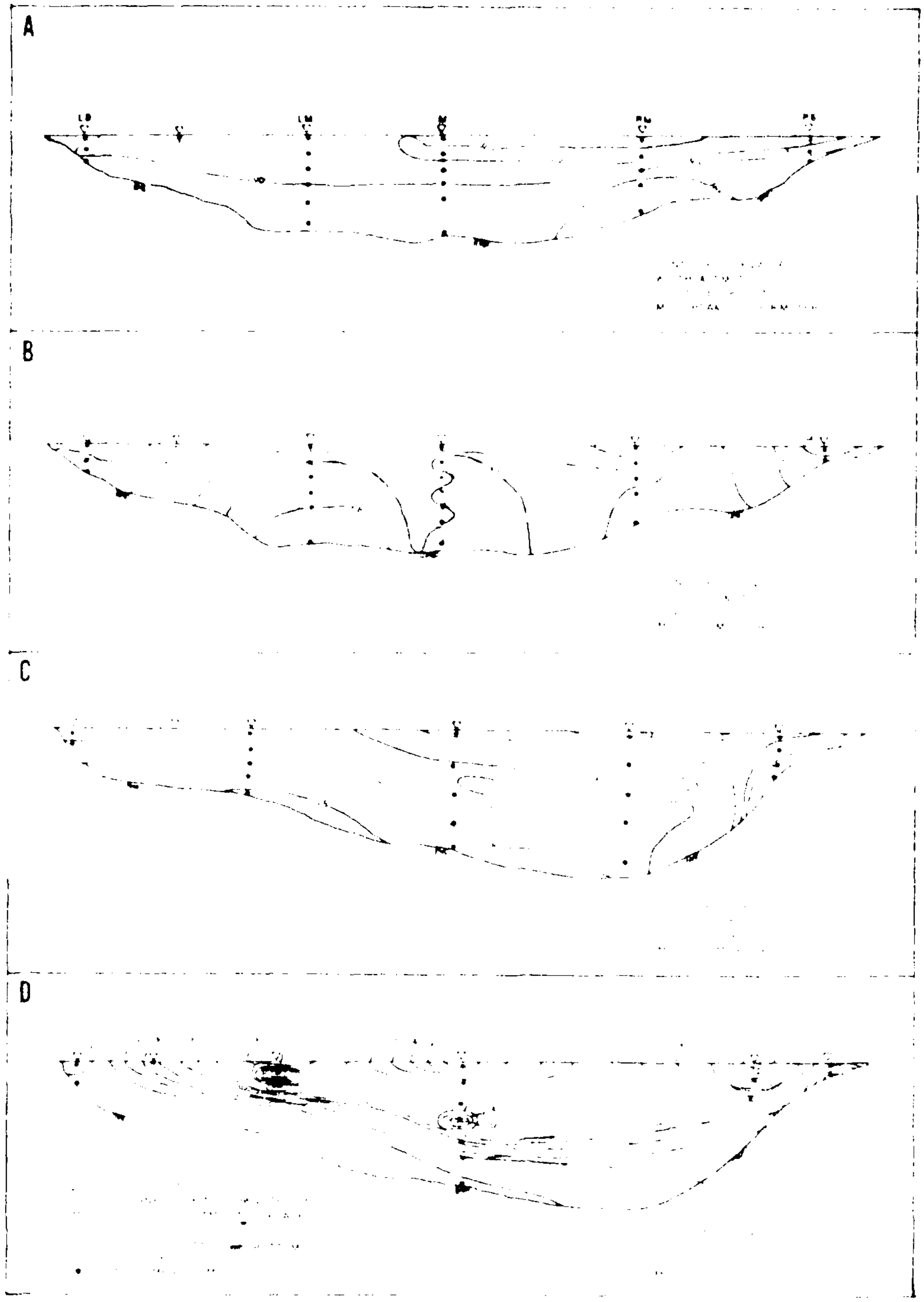

Figure A-7.--Isopleths of pH, specific conductance, temperature, dissolved oxygen concentration, and oxidation reduction potential at station 34 during August 1977.

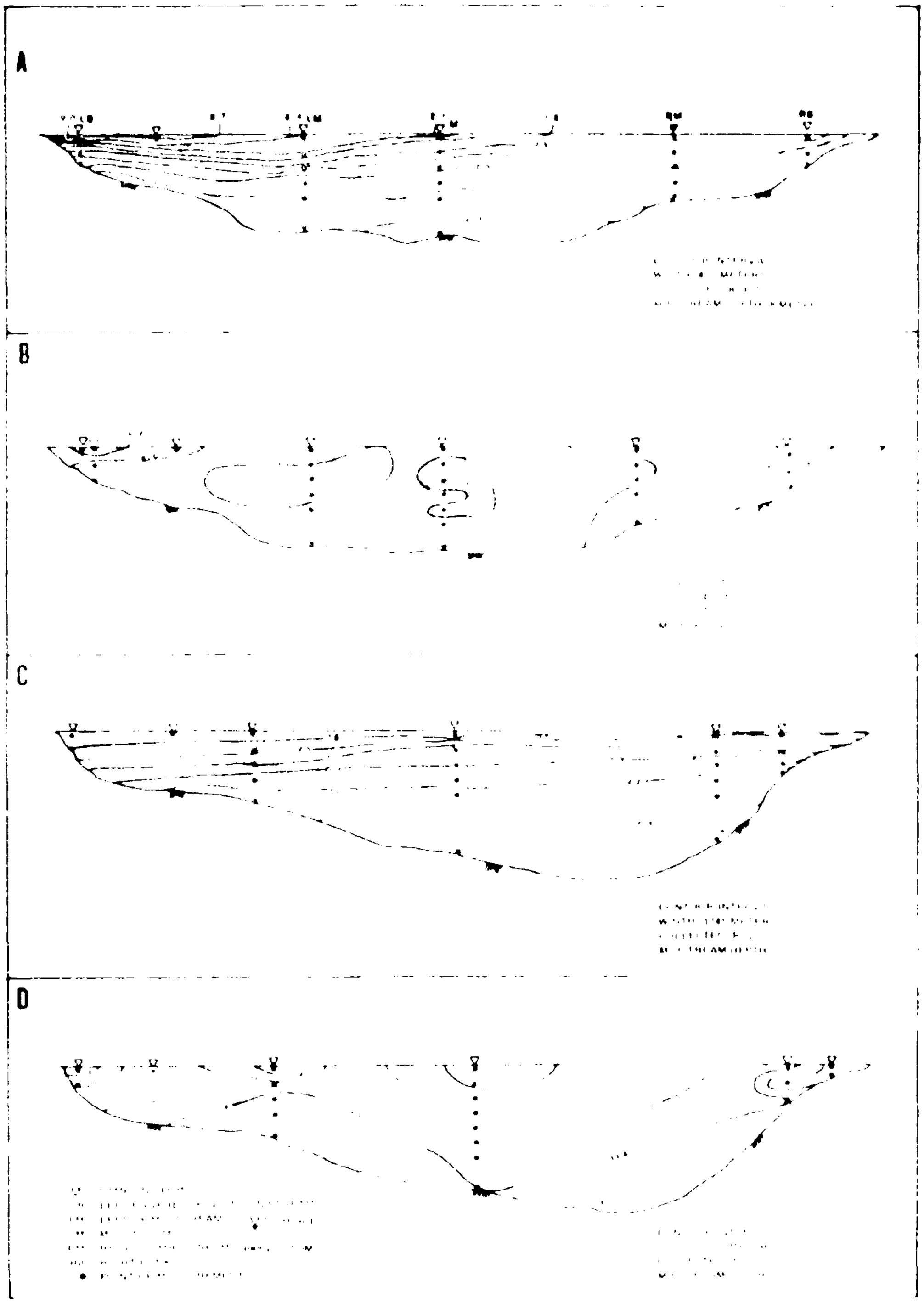

Figure A-8.--Isopleths of pH, specific conductance, temperature, and dissolved oxygen concentrations at station 3a during August 1977.

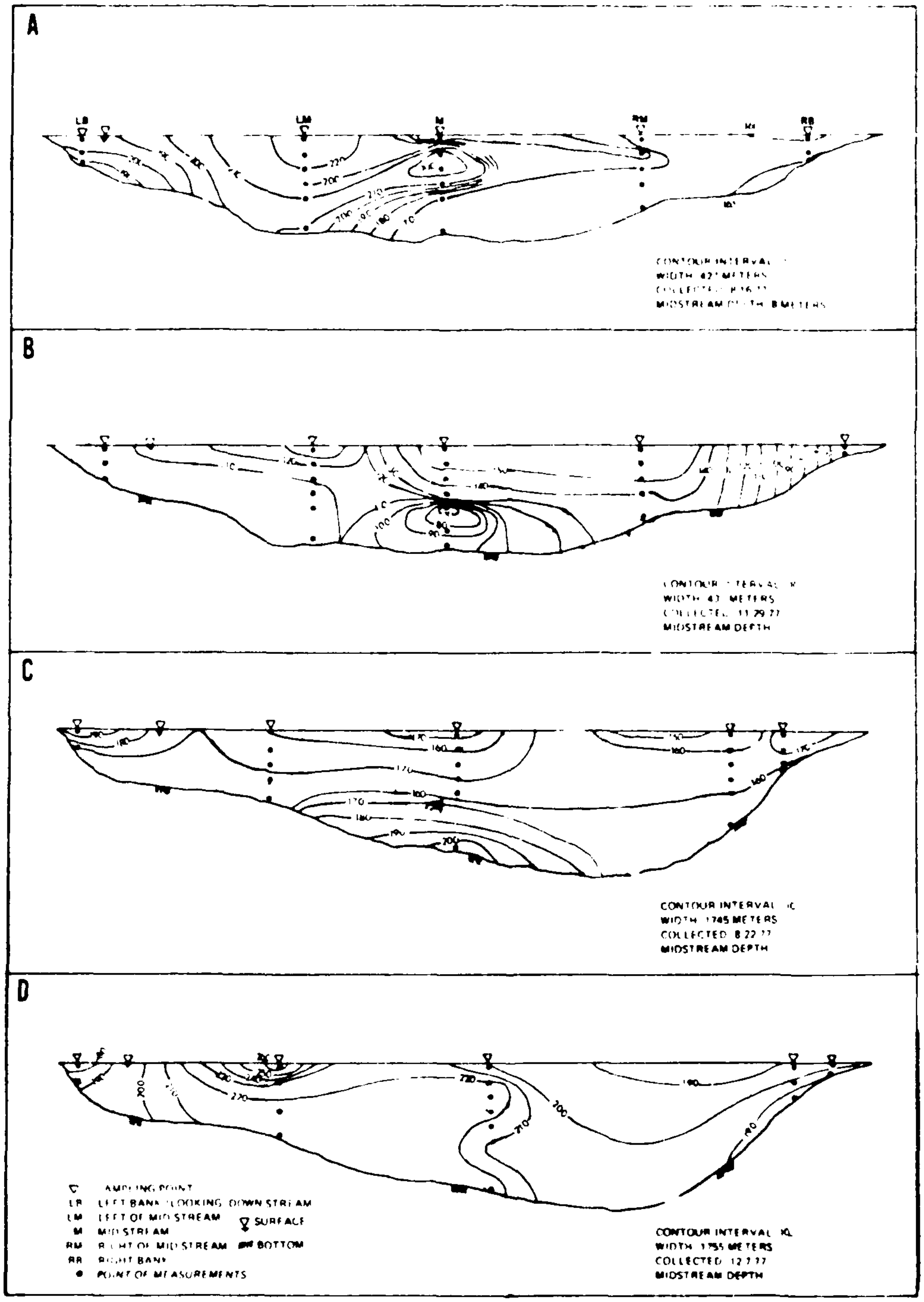

Figure A-9.--Isopleths of pH, specific conductance, temperature, dissolved oxygen concentrations, and oxidation reduction potential at station 43 during August 1977.

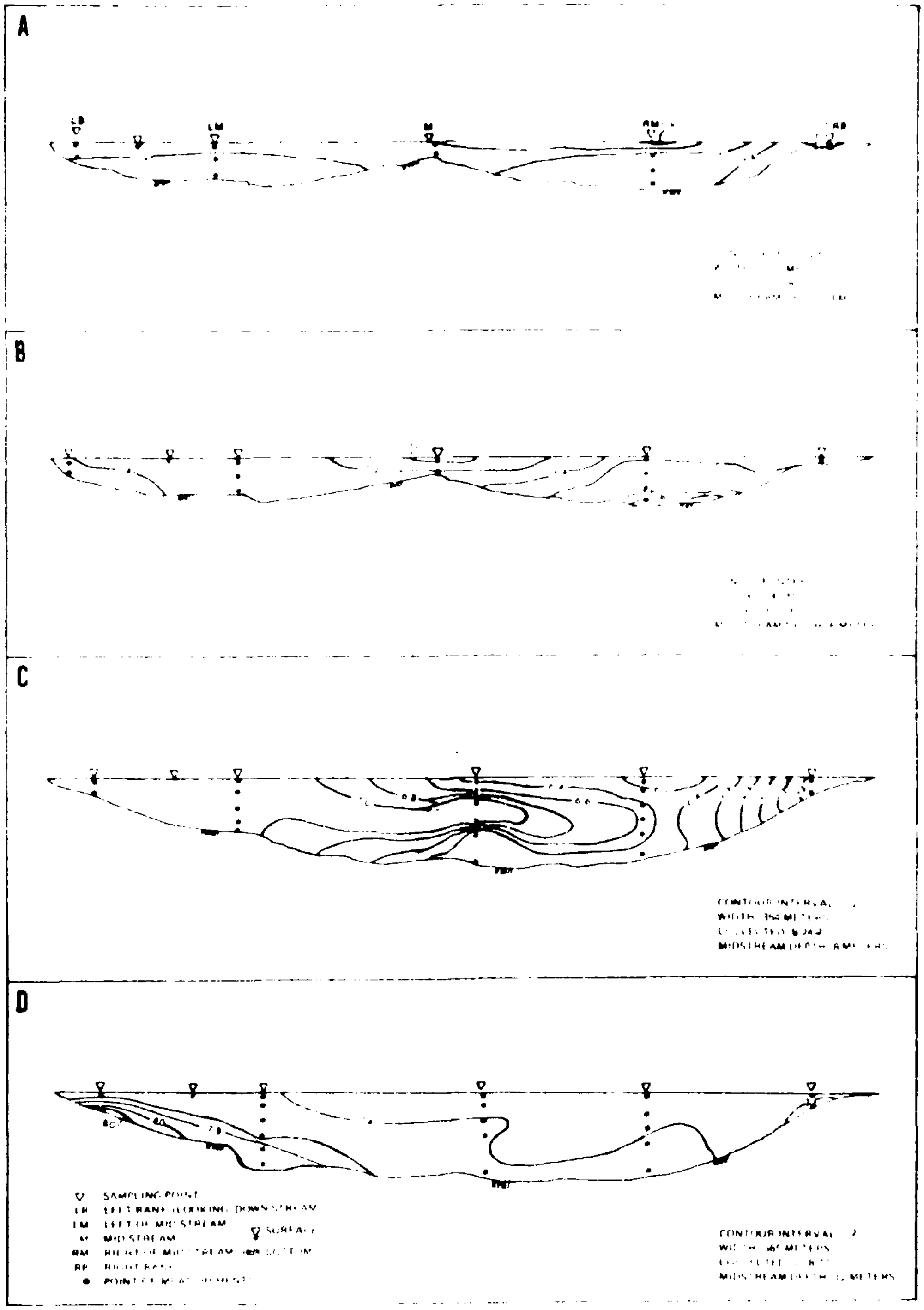

Figure A-10.--Isopleths of pH, specific conductance, temperature, dissolved oxygen concentrations, and oxidation reduction potential at station 17 during November 1977.

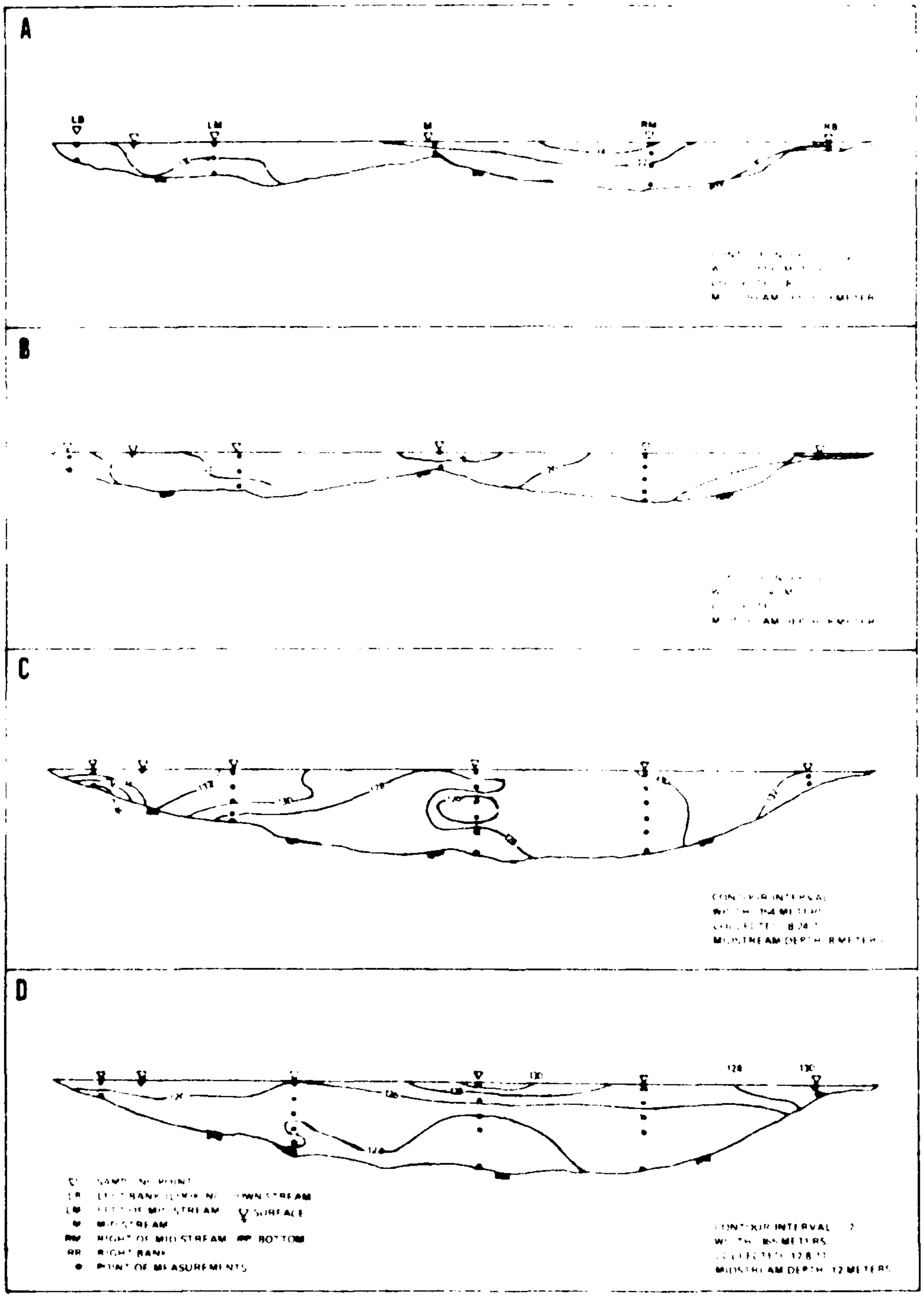

Figure A-11.--Isopleths of pH, specific conductance, temperature, dissolved oxygen concentrations, and oxidation reduction potential at station 33 during December, 1977.

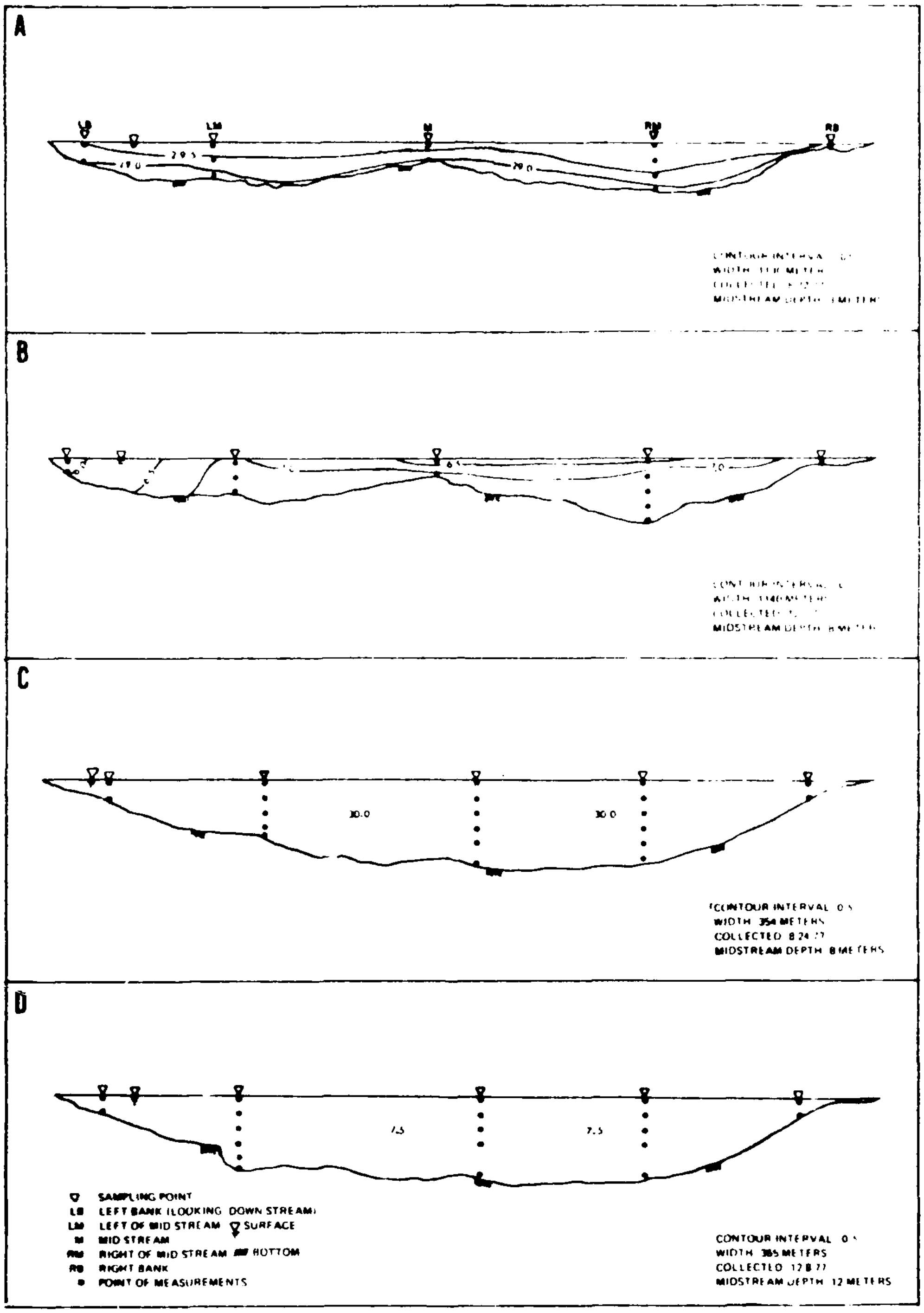

Figure A-12.--Isopleths of pH, specific conductance, temperature, dissolved oxygen concentrations, and oxidation reduction potential at station 34 during December 1977.

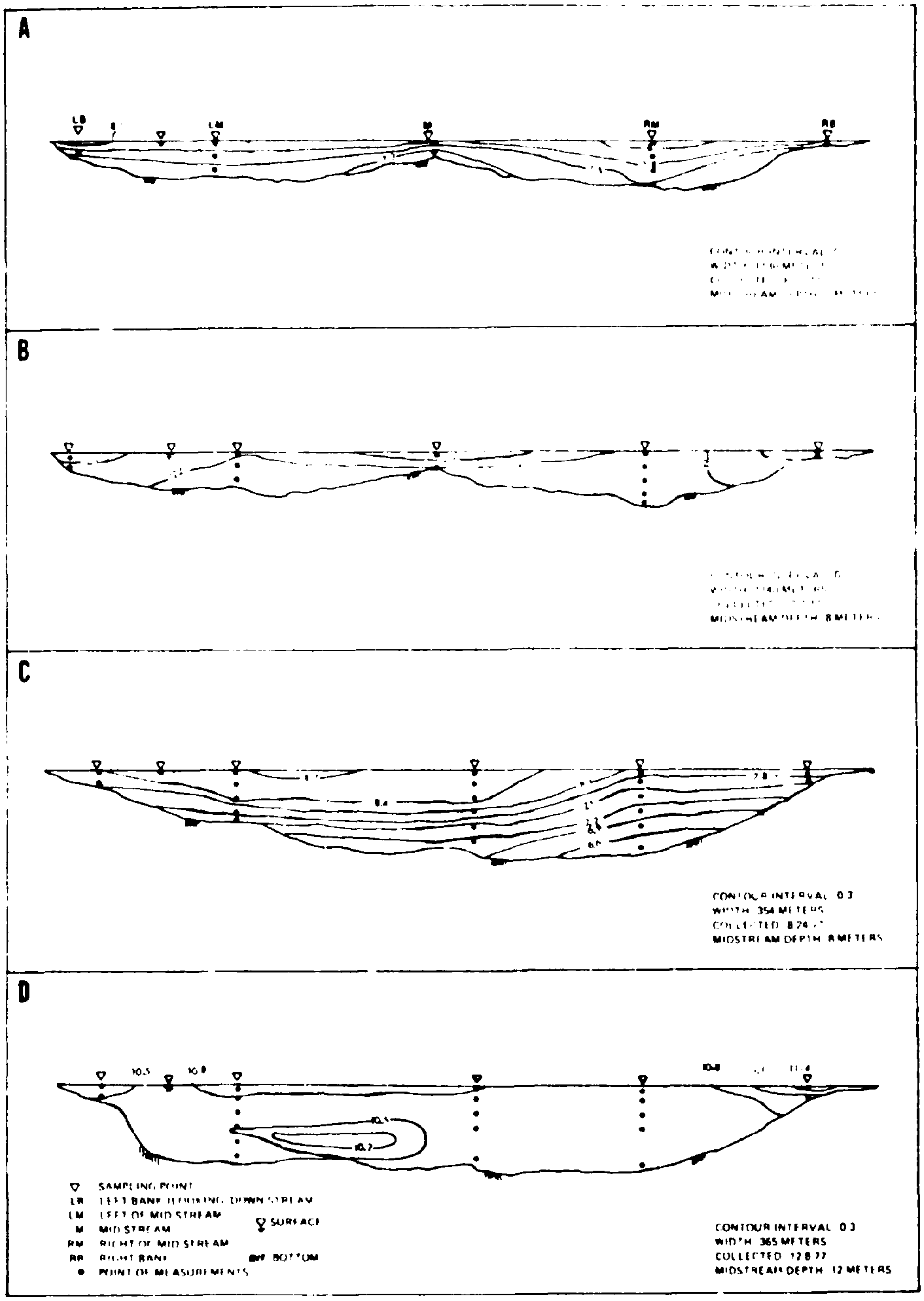

Figure A-13.--Isopleths of pH, specific conductance, temperature, dissolved oxygen concentrations, and oxidation reduction potential at station 43 during December 1977.

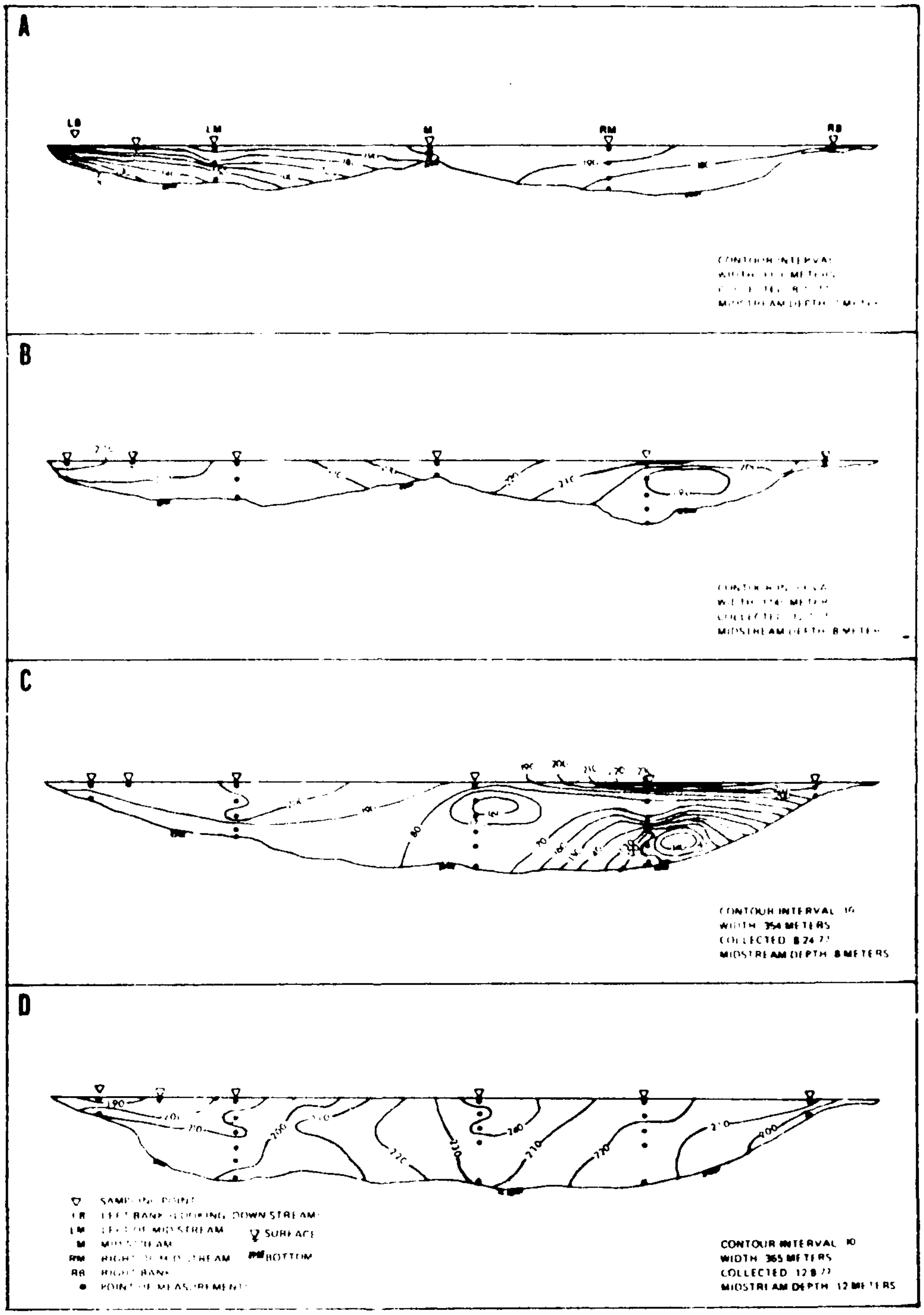

Figure A-14.--Oxidation reduction potential (millivolts +) versus depth (meters) profile for site 34 (A) and (B), and site 43 (C) and (D) on the Alabama River.

APPENDIX B

Plankton Data

Table B-1.--Estimated number (n/1) of crustaceans collected from the Alabama River with an 80-micron aperture Wisconsin plankton net.

Taxa		Station Numbers 1	2	3	4	5	6
Phylum: Arthropoda (Crustacea)							
Cladocera							
Bosminidae							
Bosmina	I	-	12.80	9.79	8.90	9.64	11.89
	II	0.65	0.16	0.11	0.42	0.67	2.03
	III	6.40	6.69	3.95	2.55	2.71	7.44
Bosminiopsis	I	-	-	-	-	-	-
	II	0.05	0.06	0.18	0.05	0.06	0.37
	III	0.05	-	-	-	-	0.09
Daphnidae							
Daphnia	I	-	-	-	-	0.06	0.08
	II	-	-	-	-	0.06	-
	III	-	-	0.07	-	-	-
Moina	I	-	3.71	1.41	0.42	0.60	1.36
	II	0.07	-	0.01	0.33	0.26	0.64
	III	-	-	-	-	0.04	0.18
Holopedidae							
Holopedium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Sididae							
Latonopsis	I	-	0.46	0.09	-	-	0.42
	II	-	-	0.01	0.76	0.06	0.51
	III	-	-	-	-	0.02	-
Chydoridae							
Leydigia	I	-	-	-	-	-	-
	II	-	-	-	0.05	-	-
	III	-	-	-	-	-	-
Alona	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	0.06	0.14
	III	-	-	-	-	-	-

I=August 9-25, 1977, samples
II=September 19-October 4, 1977, samples
III=October 31-November 17, 1977, samples

NOTE: Due to a computation error, plankton concentrations in this table were underestimated. To obtain the correct concentration, all values should be divided by .694.

Table B-1.--Continued

Taxa		Station Numbers					
		7	8	9	10	11	12
Phylum: Arthropoda (Crustacea)							
Cladocera							
Bosminidae							
Bosmina	I	6.31	17.76	51.65	37.07	24.42	15.46
	II	1.56	0.53	0.16	0.64	1.13	1.07
	III	3.19	3.52	4.32	1.98	2.79	0.83
Bosminiopsis	I	-	0.40	0.40	-	0.28	0.20
	II	0.25	0.09	0.03	0.40	1.08	0.29
	III	-	-	-	-	-	-
Daphnidae							
Daphnia	I	0.16	-	0.13	-	-	0.10
	II	-	-	0.06	-	-	-
	III	-	-	-	-	-	-
Moina	I	1.10	4.51	5.40	4.90	2.54	1.28
	II	-	0.53	0.13	0.54	0.23	0.63
	III	-	-	-	-	0.04	-
Holopedidae							
Holopedium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Sididae							
Latonopsis	I	0.63	3.45	5.80	3.68	4.10	3.84
	II	0.50	0.35	0.32	0.94	0.32	0.55
	III	-	-	-	-	-	-
Chydoridae							
Leydigia	I	-	-	-	-	-	-
	II	-	0.09	-	-	-	-
	III	-	-	-	-	-	-
Alona	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	0.05	-
	III	-	-	-	-	-	-

Table B-1.--Continued

Taxa		Station Numbers 13	14	15	16	17	18
Phylum: Arthropoda (Crustacea)							
Cladocera							
Bosminidae							
Bosmina	I	30.37	24.36	24.50	12.90	3.64	15.92
	II	0.83	0.30	5.79	0.84	1.17	3.89
	III	1.59	0.34	1.38	1.19	1.46	1.09
Bosminiopsis	I	0.42	0.11	1.50	1.80	0.26	1.08
	II	0.10	0.03	0.35	0.31	0.19	0.52
	III	-	-	-	-	-	-
Daphnidae							
Daphnia	I	-	-	0.19	-	-	-
	II	-	-	-	0.04	-	0.02
	III	-	-	-	-	-	-
Moina	I	1.13	4.10	3.85	1.74	1.15	5.81
	II	0.26	-	0.09	0.27	0.32	0.73
	III	-	0.07	-	-	-	-
Holopedidae							
Holopedium	I	0.04	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Sididae							
Latonopsis	I	1.98	10.13	11.36	8.05	1.69	9.36
	II	0.31	-	0.35	0.31	0.81	1.10
	III	-	-	-	-	-	-
Chydoridae							
Leydigia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Alona	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	0.02
	III	-	-	-	-	-	-

Table B-1.--Continued

Taxa		Station Numbers					
		19	20	21	22	23	24
Phylum: Arthropoda (Crustacea)							
Cladocera							
Bosminidae							
Bosmina	I	9.87	5.69	5.60	7.41	15.13	4.19
	II	8.57	2.34	0.49	6.40	1.77	6.96
	III	4.78	0.81	3.68	2.14	3.67	2.47
Bosminiopsis	I	1.05	0.86	0.62	0.73	2.89	1.12
	II	2.58	0.47	0.28	2.37	0.44	0.88
	III	-	-	-	-	-	-
Daphnidae							
Daphnia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Moina	I	0.10	1.07	1.09	2.05	1.32	1.54
	II	0.37	-	-	-	-	0.73
	III	0.09	-	-	0.06	-	-
Holopedidae							
Holopedium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Sididae							
Latonopsis	I	0.10	2.63	4.98	4.24	0.33	2.23
	II	0.37	-	0.04	-	-	0.29
	III	-	-	0.11	-	-	-
Chydoridae							
Leydigia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Alona	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-1.--Continued

Taxa		Station Numbers					
		25	26	27	28	29	30
Phylum: Arthropoda (Crustacea)							
Cladocera							
Bosminidae							
Bosmina	I	3.52	17.50	4.00	0.96	1.49	1.36
	II	12.27	5.65	14.04	1.34	8.87	8.00
	III	2.31	2.21	2.53	0.75	3.46	1.34
Bosminiopsis	I	0.59	0.56	0.51	0.34	0.03	-
	II	0.53	0.34	4.03	0.76	0.95	8.35
	III	-	-	-	-	-	-
Daphnidae							
Daphnia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Moina	I	3.12	3.47	2.69	0.52	2.07	0.84
	II	1.23	0.21	-	-	-	-
	III	0.06	0.06	0.11	-	-	-
Holopedidae							
Holopedium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Sididae							
Latonopsis	I	6.14	9.52	6.98	3.74	9.77	5.96
	II	3.04	0.34	-	-	-	0.77
	III	0.06	-	-	-	-	-
Chydoridae							
Leydigia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.06	-	-	-
Alona	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	0.44	-	-	-
	III	-	-	-	-	-	-

Table B-1.--Continued

Taxa		Station Numbers					
		31	32	33	34	35	36
Phylum: Arthropoda (Crustacea)							
Cladocera							
Bosminidae							
Bosmina	I	4.29	1.46	3.42	5.33	7.34	3.06
	II	13.20	12.15	23.34	38.37	9.16	28.14
	III	0.59	0.56	0.58	0.29	0.81	1.03
Bosminiopsis	I	0.16	0.27	0.25	-	0.14	-
	II	7.73	11.38	43.97	20.60	12.65	45.33
	III	-	-	-	-	-	-
Daphnidae							
Daphnia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Moina	I	0.35	0.46	0.50	-	1.66	0.72
	II	-	-	7.10	0.71	-	-
	III	-	0.05	-	-	-	-
Holopedidae							
Holopedium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Sididae							
Latonopsis	I	6.46	4.46	1.74	2.67	3.46	1.80
	II	-	-	5.07	3.55	-	-
	III	-	-	-	-	-	-
Chydoridae							
Leydigia	I	0.04	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Alona	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.06	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-1.--Continued

Taxa		Station Numbers					
		37	38	39	40	41	42
Phylum: Arthropoda (Crustacea)							
Cladocera							
Bosminidae							
Bosmina	I	9.63	3.18	3.94	3.09	2.50	4.71
	II	2.06	2.19	3.01	3.45	0.93	1.13
	III	0.15	0.64	0.10	0.23	-	0.30
Bosminiopsis	I	0.14	0.49	-	0.08	0.71	-
	II	1.70	0.84	1.27	1.92	2.80	0.49
	III	-	-	-	-	-	-
Daphnidae							
Daphnia	I	-	-	-	-	-	-
	II	-	0.03	-	-	-	0.08
	III	-	-	-	-	-	-
Moina	I	0.21	0.39	0.49	0.31	0.36	1.43
	II	0.91	0.54	1.27	1.42	0.80	0.08
	III	-	-	-	-	-	-
Holopedidae							
Holopedium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Sididae							
Latonopsis	I	0.92	2.45	5.91	4.02	1.07	6.14
	II	1.96	1.69	3.27	3.42	0.67	1.21
	III	-	-	-	-	-	-
Chydoridae							
Leydigia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Alona	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-1.--Continued

Taxa		Station Numbers			
		43	44	45	46
Phylum: Arthropoda (Crustacea)					
Cladocera					
Bosminidae					
Bosmina	I	1.77	4.90	7.18	3.93
	II	2.21	2.25	1.29	2.06
	III	0.58	0.36	0.18	0.10
Bosminiopsis	I	0.05	0.49	0.41	-
	II	0.50	0.48	0.25	0.15
	III	-	-	-	-
Daphnidae					
Daphnia	I	-	-	-	-
	II	0.06	0.18	0.03	-
	III	-	0.04	-	-
Moina	I	0.78	1.14	1.02	0.39
	II	0.77	0.59	0.46	0.33
	III	-	-	-	-
Holopedidae					
Holopedium	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Sididae					
Latonopsis	I	3.86	4.57	6.15	1.44
	II	1.05	1.66	0.49	0.87
	III	-	-	-	-
Chydoridae					
Leydigia	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Alona	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Genus undetermined	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-

Table B-1.--Continued

Taxa		Station Numbers					
		1	2	3	4	5	6
Phylum: Arthropoda (cont'd)							
Copepoda							
Cyclopidae							
<u>Cyclops</u>	I	-	1.85	0.81	0.30	0.24	1.27
	II	0.25	-	0.07	0.42	0.03	0.47
	III	0.28	0.50	0.47	0.32	0.24	0.36
Diaptomidae							
<u>Diaptomus</u>	I	-	2.16	1.44	0.36	0.24	0.51
	II	0.05	0.03	0.01	0.09	0.06	0.20
	III	0.05	-	0.07	0.04	0.04	0.18
Ostracoda	I	-	0.15	-	-	-	-
	II	-	-	-	-	0.03	-
	III	-	-	-	-	-	-
Nauplii	I	-	5.41	8.54	1.43	2.01	7.82
	II	0.36	-	0.22	0.94	0.26	2.10
	III	1.02	0.43	0.44	0.61	0.24	0.91

Table B-1.--Continued

Taxa		Station Numbers					
		7	8	9	10	11	12
Phylum: Arthropoda (cont'd)							
Copepoda							
Cyclopidae							
Cyclops	I	1.20	2.40	3.43	2.14	1.70	0.69
	II	0.25	0.18	0.18	0.32	0.92	0.69
	III	0.34	0.19	-	0.36	0.04	-
Diaptomidae							
Diaptomus	I	1.61	2.80	1.32	2.45	2.12	1.18
	II	0.38	-	0.18	0.35	0.11	0.49
	III	0.08	-	0.09	0.08	-	0.06
Ostracoda	I	-	-	-	-	-	-
	II	-	-	-	-	-	0.03
	III	-	-	-	0.04	-	-
Nauplii	I	4.85	6.89	7.91	5.52	5.93	3.74
	II	1.26	0.61	0.70	0.97	2.20	2.88
	III	0.79	0.60	0.18	0.36	0.12	0.06

Table B-1.--Continued

Taxa		Station Numbers					
		13	14	15	16	17	18
Phylum: Arthropoda (cont'd)							
Copepoda							
Cyclopidae							
Cyclops	I	1.13	1.29	3.38	1.33	0.75	1.18
	II	0.10	0.08	-	0.46	0.89	2.37
	III	0.23	0.20	0.16	0.36	0.43	0.25
Diaptomidae							
Diaptomus	I	0.99	1.08	2.54	1.33	1.18	2.46
	II	0.16	-	-	0.19	0.17	0.62
	III	-	0.13	0.16	0.04	0.11	0.05
Ostracoda	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Nauplii	I	2.40	6.90	16.24	6.72	2.67	7.74
	II	0.47	-	2.02	0.84	1.09	1.89
	III	0.23	0.47	0.32	0.32	0.76	0.50

Table B-1.--Continued

Taxa		Station Numbers					
		19	20	21	22	23	24
Phylum: Arthropoda (cont'd)							
Copepoda							
Cyclopidae							
Cyclops	I	1.10	0.70	1.09	2.44	1.32	1.26
	II	10.88	2.19	0.73	6.97	0.09	8.72
	III	1.02	0.60	0.82	0.82	2.99	0.33
Diaptomidae							
Diaptomus	I	0.20	1.15	1.40	4.44	-	0.70
	II	0.09	-	0.08	-	-	1.17
	III	0.26	0.07	0.33	0.13	0.17	-
Ostracoda	I	-	-	-	-	-	-
	II	0.09	-	-	-	-	-
	III	-	-	-	-	-	-
Nauplii	I	1.20	9.12	14.78	9.86	2.73	3.77
	II	6.73	-	0.32	2.00	0.03	2.93
	III	2.05	0.25	1.10	0.57	1.11	0.33

Table B-1.--Continued

<u>Taxa</u>		<u>Station Numbers</u>					
		25	26	27	28	29	30
Phylum: Arthropoda (cont'd)							
Copepoda							
Cyclopidae							
<u>Cyclops</u>	I	0.90	3.58	1.77	0.07	1.60	2.49
	II	4.73	17.93	3.81	0.67	1.18	8.41
	III	1.09	0.50	1.52	0.63	0.49	0.30
Diaptomidae							
<u>Diaptomus</u>	I	1.13	0.90	3.89	0.58	3.22	1.88
	II	0.23	0.48	-	-	-	1.23
	III	0.12	0.06	0.11	0.13	0.12	0.15
Ostracoda	I	-	-	-	-	-	-
	II	-	0.07	0.87	0.08	-	-
	III	-	0.06	-	-	0.06	-
Nauplii	I	3.48	3.36	5.03	1.34	5.37	3.80
	II	1.00	1.38	1.20	-	-	1.01
	III	0.49	0.69	1.18	1.64	0.91	0.59

Table B-1.--Continued

Taxa		Station Numbers					
		31	32	33	34	35	36
Phylum: Arthropoda (cont'd)							
Copepoda							
Cyclopidae							
Cyclops	I	2.41	1.82	1.31	2.22	3.88	2.70
	II	7.24	4.05	12.51	34.10	3.78	20.96
	III	0.15	0.20	0.13	0.29	0.52	0.30
Diaptomidae							
Diaptomus	I	2.80	2.10	0.62	2.22	3.60	2.34
	II	0.10	0.08	3.04	18.47	-	-
	III	0.07	0.10	0.06	0.29	0.07	0.24
Ostracoda	I	-	-	-	-	-	-
	II	0.20	0.08	0.68	-	-	-
	III	-	-	-	-	-	-
Nauplii	I	7.86	3.60	4.66	1.33	3.74	3.97
	II	-	0.08	41.26	26.29	1.04	17.80
	III	0.30	0.66	0.32	0.86	0.44	1.33

Table B-1.--Continued

Taxa		Station Numbers					
		37	38	39	40	41	42
Phylum: Arthropoda (cont'd)							
Copepoda							
Cyclopidae							
<u>Cyclops</u>	I	0.99	0.44	0.98	0.46	0.18	0.71
	II	1.55	0.94	1.57	1.79	0.27	0.97
	III	0.05	0.35	0.10	0.16	0.29	-
Diaptomidae							
<u>Diaptomus</u>	I	0.85	0.78	0.66	0.54	-	0.43
	II	0.79	0.94	1.83	1.14	-	0.65
	III	-	0.14	0.10	-	-	0.30
Ostracoda	I	-	-	-	-	-	-
	II	-	-	-	0.09	-	-
	III	-	-	0.10	-	-	-
Nauplii	I	0.28	0.29	0.41	1.70	2.68	2.43
	II	0.43	2.36	9.56	3.45	1.33	0.97
	III	0.10	0.42	0.60	0.08	4.32	0.10

Table B-1.--Continued

Taxa		Station Numbers			
		43	44	45	46
Phylum: Arthropoda (cont'd)					
Copepoda					
Cyclopidae					
<u>Cyclops</u>	I	0.73	0.98	2.26	0.66
	II	0.83	1.03	0.52	1.14
	III	0.07	0.18	0.09	0.15
Diaptomidae					
<u>Diaptomus</u>	I	1.04	1.47	1.64	0.66
	II	0.44	1.36	0.71	0.84
	III	0.07	0.04	0.09	0.05
Ostracoda	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Nauplii	I	0.99	2.78	1.02	1.57
	II	1.99	4.13	1.45	1.63
	III	0.15	0.14	0.13	0.10

Table B-2.--Estimated number (n/l) of rotifers collected from the Alabama River with an 80-micron aperture Wisconsin plankton net.

Taxa		Station Numbers 1	2	3	4	5	6
Phylum: Rotifera							
Ploima							
Brachionidae							
Brachionus	I	-	-	0.99	0.06	0.18	0.17
	II	0.09	-	0.25	0.09	-	0.27
	III	-	0.07	0.23	0.08	0.09	0.27
Kellicottia	I	-	-	-	-	-	0.17
	II	-	-	-	-	-	0.04
	III	-	0.07	0.07	0.20	0.04	0.09
Keratella	I	-	1.85	1.80	-	0.47	1.78
	II	0.07	0.06	0.80	0.24	0.12	1.15
	III	0.23	0.07	0.23	0.20	0.13	0.09
Platyus	I	-	3.71	3.68	2.39	3.96	2.29
	II	0.58	-	0.18	0.24	0.23	0.81
	III	-	-	0.07	-	-	-
Euchlanis	I	-	-	-	-	-	-
	II	0.11	-	-	0.05	-	0.27
	III	-	-	-	-	-	-
Notholca	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Macrochaetus	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lepadella	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	0.09
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	0.03	-
	III	-	-	-	-	-	-
Gastropidae							
Gastropus	I	-	-	0.18	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

I=August 9-25, 1977, samples
II=September 19-October 4, 1977, samples
III=October 31-November 17, 1977, samples

NOTE: Due to a computation error, plankton concentrations in this table were underestimated. To obtain the correct concentration, all values should be divided by .694.

Table B-2.--Continued

Taxa		Station Numbers					
		7	8	9	10	11	12
Phylum: Rotifera							
Ploima							
Brachionidae							
Brachionus	I	0.47	0.27	0.40	1.53	1.98	3.74
	II	0.38	0.09	0.08	0.22	0.32	0.72
	III	0.08	0.28	-	1.62	0.28	0.06
Kellicottia	I	-	-	-	-	0.14	-
	II	-	-	-	-	0.05	-
	III	0.11	-	-	0.04	0.04	-
Keratella	I	1.58	4.51	4.22	0.92	3.11	5.02
	II	0.31	-	0.20	0.25	0.27	0.49
	III	0.08	0.14	0.09	0.04	-	-
Platyus	I	2.20	3.18	4.22	2.14	3.25	1.87
	II	0.38	0.26	-	0.30	0.23	0.60
	III	-	-	-	-	-	-
Euchlanis	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Notholca	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Macrochaetus	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lepadella	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Gastropidae							
Gastropus	I	-	-	-	0.15	-	0.10
	II	-	-	0.19	-	0.11	-
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		13	14	15	16	17	18
Phylum: Rotifera							
Ploima							
Brachionidae							
Brachionus	I	1.27	1.19	6.48	3.33	1.83	1.29
	II	0.16	-	0.09	0.08	0.06	0.33
	III	0.40	-	-	0.04	-	-
Kellicottia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.07	-	-	-	-
Keratella	I	1.98	3.77	4.50	3.40	1.49	2.26
	II	0.16	-	0.35	0.08	-	0.06
	III	0.06	-	-	-	-	-
Platyus	I	0.57	1.08	2.06	0.87	0.29	0.43
	II	0.10	-	-	0.08	-	0.21
	III	-	-	-	-	-	-
Euchlanis	I	-	-	-	-	-	-
	II	-	-	-	-	-	0.02
	III	-	-	-	-	-	-
Notholca	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Macrochaetus	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lepadella	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Gastropidae							
Gastropus	I	-	-	-	-	-	-
	II	0.16	-	-	-	0.02	-
	III	-	-	-	0.04	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		19	20	21	22	23	24
Phylum: Rotifera							
Ploima							
Brachionidae							
Brachionus	I	2.06	4.20	6.07	1.99	3.80	4.75
	II	2.12	0.56	0.08	2.30	0.61	0.29
	III	0.77	0.14	0.33	0.25	0.34	0.33
Kellicottia	I	-	0.04	-	-	-	-
	II	0.09	0.06	-	-	-	0.07
	III	-	0.04	0.05	0.06	0.09	-
Keratella	I	3.58	4.40	7.78	2.45	4.80	4.61
	II	0.92	0.94	0.04	3.38	0.35	0.44
	III	0.43	0.28	0.16	0.38	0.58	0.16
Platyus	I	0.37	0.70	0.93	0.66	2.07	1.12
	II	0.65	0.31	-	2.01	0.17	0.29
	III	-	-	0.05	0.19	0.09	0.16
Euchlanis	I	-	-	-	-	-	-
	II	-	-	-	0.07	0.03	-
	III	-	-	-	-	0.09	-
Notholca	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Macrochaetus	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lepadella	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Gastropidae							
Gastropus	I	-	0.12	0.62	0.46	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		25	26	27	28	29	30
Phylum: Rotifera							
Ploima							
Brachionidae							
Brachionus	I	6.55	3.02	0.74	0.45	0.62	0.80
	II	-	-	-	-	-	2.46
	III	0.12	0.25	0.22	0.38	0.24	0.15
Kellicottia	I	-	-	-	-	-	-
	II	-	-	-	-	-	5.54
	III	0.12	0.13	0.06	0.50	0.12	-
Keratella	I	3.43	5.93	1.32	0.92	1.59	3.47
	II	0.29	0.28	1.31	0.34	-	[illegible]
	III	0.18	0.25	0.39	1.13	0.42	0.15
Platyus	I	4.38	2.02	0.11	0.17	0.38	0.09
	II	0.64	1.79	16.32	0.59	0.71	1.59
	III	-	-	0.17	-	0.06	-
Euchlanis	I	-	-	-	-	-	-
	II	-	-	-	-	0.12	-
	III	-	-	-	-	-	-
Notholca	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Macrochaetus	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.06	-	-	-
Lepadella	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Gastropidae							
Gastropus	I	0.36	-	-	-	-	-
	II	-	0.07	-	-	-	-
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		31	32	33	34	35	36
Phylum: Rotifera							
Ploima							
Brachionidae							
<u>Brachionus</u>	I	0.78	0.77	0.31	-	0.69	-
	II	6.26	19.08	14.54	14.21	1.61	2.17
	III	-	-	-	-	-	0.12
<u>Kellicottia</u>	I	-	-	-	-	-	-
	II	4.40	1.83	-	2.13	-	-
	III	0.07	0.05	-	-	-	0.30
<u>Keratella</u>	I	1.48	0.64	1.68	1.33	0.97	-
	II	1.37	-	15.90	5.68	4.25	9.07
	III	-	0.05	-	-	-	0.06
<u>Platyus</u>	I	0.08	0.14	-	-	1.11	-
	II	1.37	-	2.03	7.11	1.42	3.58
	III	-	-	-	-	-	-
<u>Euchlanis</u>	I	-	-	-	-	-	-
	II	0.20	-	-	-	-	-
	III	-	-	-	-	-	-
<u>Notholca</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.06	-	-	-
<u>Macrochaetus</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
<u>Lepadella</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Gastropidae							
<u>Gastropus</u>	I	-	0.05	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		37	38	39	40	41	42
Phylum: Rotifera							
Ploima							
Brachionidae							
Brachionus	I	0.21	-	-	0.08	10.90	0.85
	II	0.89	0.03	0.26	0.06	17.97	0.89
	III	0.05	-	-	-	-	0.10
Kellicottia	I	-	-	-	-	-	-
	II	-	0.03	-	-	-	-
	III	-	-	0.10	-	-	-
Keratella	I	0.28	-	-	0.08	3.03	0.71
	II	0.18	-	0.35	0.09	0.93	0.08
	III	-	0.07	0.10	0.08	0.58	-
Platyus	I	0.42	0.10	-	0.38	0.71	-
	II	-	0.10	0.22	0.12	0.40	-
	III	-	-	-	-	-	-
Euchlanis	I	-	-	-	-	-	-
	II	-	0.07	-	-	-	-
	III	-	-	-	-	-	-
Notholca	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Macrochaetus	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lepadella	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Gastropidae							
Gastropus	I	-	-	-	-	-	-
	II	0.03	0.13	0.35	0.18	0.67	-
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers			
		43	44	45	46
Phylum: Rotifera					
Ploima					
Brachionidae					
<u>Brachionus</u>	I	0.10	1.96	-	-
	II	0.50	0.33	0.12	0.03
	III	-	-	0.04	-
<u>Kellicottia</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	0.04	-	0.05
<u>Keratella</u>	I	-	0.33	-	0.52
	II	-	0.26	0.06	0.06
	III	-	-	0.04	-
<u>Platyus</u>	I	0.05	0.16	0.62	0.26
	II	-	0.04	0.06	-
	III	-	-	-	-
<u>Euchlanis</u>	I	-	-	-	-
	II	-	-	-	0.03
	III	-	-	-	-
<u>Notholca</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
<u>Macrochaetus</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
<u>Lepadella</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Genus undetermined	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Gastropidae					
<u>Gastropus</u>	I	-	-	-	-
	II	-	-	-	0.03
	III	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers 1	2	3	4	5	6
Phylum: Rotifera (cont'd)							
Lecanidae							
Monostyla	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lecane	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Notomatidae							
Tamphrocampa	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Trichocercidae							
Trichocerca	I	-	0.93	0.63	-	0.36	0.08
	II	0.05	-	0.11	-	0.06	0.03
	III	0.05	0.14	0.13	0.08	0.02	0.27
Asplanchnidae							
Asplanchna	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.07	-	0.04	-	-
Synchaetidae							
Pleosoma	I	-	-	-	-	-	-
	II	-	-	-	-	0.10	-
	III	0.05	0.18	0.17	0.28	0.11	0.18
Polyarthra	I	-	0.62	1.08	0.66	1.80	2.38
	II	0.02	-	0.33	0.38	0.15	0.20
	III	1.21	0.07	0.20	1.38	0.12	0.27
Synchaeta	I	-	-	3.50	0.60	2.50	1.95
	II	-	-	-	-	0.03	0.04
	III	-	-	-	-	-	-
Flosculariaceae							
Testudinellidae							
Filinia	I	-	-	-	-	-	-
	II	-	-	-	-	-	0.04
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		7	8	9	10	11	12
Phylum: Rotifera (cont'd)							
Lecanidae							
<u>Monostyla</u>	I	-	-	-	-	-	-
	II	-	-	-	0.07	0.11	0.06
	III	-	-	-	-	0.04	-
<u>Lecane</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Notomatidae							
<u>Tamphrocampa</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Trichocercidae							
<u>Trichocerca</u>	I	0.16	0.27	0.53	0.15	0.42	0.39
	II	-	-	0.11	0.02	-	0.09
	III	-	0.05	-	-	-	-
Asplanchnidae							
<u>Asplanchna</u>	I	-	-	-	-	-	-
	II	-	-	-	-	0.11	-
	III	-	-	-	0.08	-	-
Synchaetidae							
<u>Pleosoma</u>	I	-	-	-	-	-	0.10
	II	0.13	-	0.03	-	0.11	0.03
	III	0.08	0.28	-	0.12	-	-
<u>Polyarthra</u>	I	2.84	1.72	3.82	4.44	3.39	4.43
	II	0.19	-	0.33	0.07	0.27	0.17
	III	0.11	0.09	0.18	0.28	0.04	-
<u>Synchaeta</u>	I	0.79	3.31	4.22	2.30	0.56	4.04
	II	0.06	-	0.06	-	-	-
	III	-	-	-	0.08	-	-
Flosculariaceae							
Testudinellidae							
<u>Filinia</u>	I	-	-	-	0.15	-	-
	II	-	-	0.02	0.02	-	-
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		13	14	15	16	17	18
Phylum: Rotifera (cont'd)							
Lecanidae							
Monostyla	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.06	-	-	-	-	-
Lecane	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Notomatidae							
Tamphrocampa	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Trichocercidae							
Trichocerca	I	-	0.32	0.75	0.67	0.11	0.22
	II	0.05	-	0.09	-	0.04	0.02
	III	-	-	-	-	0.05	-
Asplanchnidae							
Asplanchna	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.08	0.07	-	-
Synchaetidae							
Pleosoma	I	0.14	1.72	5.54	0.39	0.49	0.22
	II	-	-	-	-	-	-
	III	-	0.33	0.08	-	-	-
Polyarthra	I	2.26	7.11	12.30	0.62	0.46	0.22
	II	0.10	0.03	0.26	0.08	0.11	0.04
	III	0.17	0.07	0.08	0.04	0.05	0.05
Synchaeta	I	2.12	1.62	2.72	0.67	0.11	0.75
	II	-	-	0.09	-	0.02	-
	III	0.06	-	-	0.04	-	-
Flosculariaceae							
Testudinellidae							
Filinia	I	-	-	-	-	-	-
	II	-	-	-	0.04	-	-
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		19	20	21	22	23	24
Phylum: Rotifera (cont'd)							
Lecanidae							
<u>Monostyla</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
<u>Lecane</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Notomatidae							
<u>Tamphrocampa</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Trichocercidae							
<u>Trichocerca</u>	I	0.07	0.37	0.47	-	-	0.70
	II	-	-	-	0.07	0.20	0.15
	III	-	-	0.05	-	-	-
Asplanchnidae							
<u>Asplanchna</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.11	0.13	-	-
Synchaetidae							
<u>Pleosoma</u>	I	0.25	2.14	5.60	1.92	-	1.95
	II	0.46	0.09	-	0.07	0.03	0.07
	III	0.26	0.14	0.22	0.25	0.26	0.66
<u>Polyarthra</u>	I	-	4.44	23.35	2.12	0.08	0.42
	II	0.83	0.25	-	-	-	-
	III	0.09	0.14	0.05	0.19	0.17	-
<u>Synchaeta</u>	I	-	2.17	1.87	-	-	0.70
	II	-	-	-	-	-	-
	III	-	-	-	-	0.09	-
Flosculariaceae							
Testudinellidae							
<u>Filinia</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.05	-	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		25	26	27	28	29	30
Phylum: Rotifera (cont'd)							
Lecanidae							
Monostyla	I	-	-	-	-	-	-
	II	-	-	0.11	0.08	-	-
	III	-	0.06	0.06	-	0.12	-
Lecane	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Notomatidae							
Tamphrocampa	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Trichocercidae							
Trichocerca	I	0.41	0.22	0.40	0.14	0.14	0.47
	II	-	-	0.33	-	-	1.95
	III	-	-	0.06	-	-	-
Asplanchnidae							
Asplanchna	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.13	-	-	0.06	-
Synchaetidae							
Pleosoma	I	1.13	2.35	-	0.17	0.45	0.09
	II	-	-	4.35	-	-	-
	III	0.12	0.38	0.11	0.13	0.12	0.07
Polyarthra	I	0.36	0.45	0.29	0.45	0.21	0.47
	II	-	0.07	-	-	-	0.36
	III	0.06	0.50	-	-	-	-
Synchaeta	I	2.35	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Flosculariaceae							
Testudinellidae							
Filinia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		31	32	33	34	35	36
Phylum: Rotifera (cont'd)							
Lecanidae							
Monostyla	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lecane	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Notomatidae							
Tamphrocampa	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Trichocercidae							
Trichocerca	I	0.27	0.14	0.44	-	0.28	-
	II	0.10	0.08	1.01	0.71	0.19	-
	III	-	-	-	-	-	-
Asplanchnidae							
Asplanchna	I	-	-	-	-	-	-
	II	-	0.15	3.04	-	-	-
	III	0.07	0.05	0.06	-	0.07	0.06
Synchaetidae							
Pleosoma	I	-	-	-	-	0.14	-
	II	-	-	29.76	28.42	-	-
	III	-	-	0.06	-	-	-
Polyarthra	I	1.01	0.32	0.89	-	0.83	-
	II	-	-	22.32	19.89	0.09	-
	III	-	0.10	-	-	-	0.06
Synchaeta	I	0.12	-	-	-	0.55	-
	II	0.78	-	-	-	-	-
	III	-	0.05	-	-	-	0.06
Flosculariaceae							
Testudinellidae							
Filinia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers					
		37	38	39	40	41	42
Phylum: Rotifera (cont'd)							
Lecanidae							
Monostyla	I	-	-	-	-	-	-
	II	-	-	0.26	0.18	-	-
	III	-	-	-	-	-	-
Lecane	I	-	-	-	0.08	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Notomatidae							
Tamphrocampa	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.07	-	-	-	-
Trichocercidae							
Trichocerca	I	-	-	-	-	-	-
	II	0.03	0.03	0.04	0.06	0.40	-
	III	-	-	-	-	-	-
Asplanchnidae							
Asplanchna	I	-	-	-	-	-	-
	II	0.18	-	0.35	0.12	2.66	0.08
	III	-	-	-	-	5.47	-
Synchaetidae							
Pleosoma	I	-	-	-	-	-	-
	II	1.68	0.88	1.35	1.20	4.79	0.40
	III	-	-	0.10	-	-	-
Polyarthra	I	-	-	-	0.39	23.40	1.71
	II	3.66	0.98	2.36	0.99	16.11	0.24
	III	0.05	0.07	-	-	2.59	-
Synchaeta	I	-	-	-	-	2.68	0.14
	II	0.69	0.03	-	-	2.13	-
	III	-	0.07	-	-	2.57	-
Flosculariaceae							
Testudinellidae							
Filinia	I	-	-	-	-	1.25	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers			
		43	44	45	46
Phylum: Rotifera (cont'd)					
Lecanidae					
Monostyla	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Lecane	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Notomatidae					
Tamphrocampa	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Trichocercidae					
Trichocerca	I	0.52	-	-	-
	II	0.06	-	-	0.03
	III	-	-	-	-
Asplanchnidae					
Asplanchna	I	-	-	-	-
	II	-	-	-	-
	III	0.07	-	-	-
Synchaetidae					
Pleosoma	I	-	-	-	-
	II	0.39	0.55	0.37	0.15
	III	-	-	-	-
Polyarthra	I	0.16	1.31	0.20	0.26
	II	-	0.41	-	0.06
	III	-	-	-	0.05
Synchaeta	I	-	-	-	0.26
	II	-	-	-	-
	III	-	-	-	-
Flosculariaceae					
Testudinellidae					
Filinia	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-

Table B-2.--Continued

Taxa		Station Numbers 1	2	3	4	5	6
Phylum: Rotifera (cont'd)							
Hexarthidae							
Hexarthra	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Flosculariidae							
Sinantherina	I	-	-	-	-	-	-
	II	0.05	-	-	-	-	-
	III	-	-	-	-	-	-
Conochilidae							
Conochiloides	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.03	-	-	-
Bdelloidea							
Habrotrochidae							
Genus undetermined	I	-	-	-	0.36	-	-
	II	1.21	-	0.15	0.14	0.17	0.44
	III	-	-	-	-	0.06	-
Philodinidae							
Bdelloidea	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Family undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Eggs	I	-	-	3.23	2.63	1.42	4.42
	II	0.14	-	0.15	0.05	0.15	0.47
	III	0.60	0.25	0.47	0.53	0.18	0.63

Table B-2.--Continued

Taxa		Station Numbers					
		1	2	3	4	5	6
Phylum: Rotifera (cont'd)							
Hexarthidae							
Hexarthra	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Flosculariidae							
Sinantherina	I	-	-	-	-	-	-
	II	0.05	-	-	-	-	-
	III	-	-	-	-	-	-
Conochilidae							
Conochiloides	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.03	-	-	-
Bdelloidea							
Habrotrochidae							
Genus undetermined	I	-	-	-	0.36	-	-
	II	1.21	-	0.15	0.14	0.17	0.44
	III	-	-	-	-	0.06	-
Philodinidae							
Bdelloidea	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Family undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Eggs	I	-	-	3.23	2.63	1.42	4.42
	II	0.14	-	0.15	0.05	0.15	0.47
	III	0.60	0.25	0.47	0.53	0.18	0.63

Table B-2.--Continued

Taxa		Station Numbers 7	8	9	10	11	12
Phylum: Rotifera (cont'd)							
Hexarthidae							
Hexarthra	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Flosculariidae							
Sinantherina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Conochilidae							
Conochiloides	I	-	-	-	-	-	-
	II	-	-	0.03	-	-	-
	III	-	-	0.09	-	-	-
Bdelloidea							
Habrotrochidae							
Genus undetermined	I	-	-	-	-	-	-
	II	0.19	-	0.02	0.05	0.11	0.12
	III	-	-	0.09	-	-	-
Philodinidae							
Bdelloidea	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	0.07	0.32	-
	III	-	-	-	0.04	-	-
Family undetermined	I	-	0.05	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Eggs	I	3.16	6.36	10.67	6.43	5.93	2.17
	II	0.13	0.35	0.08	0.69	0.97	0.43
	III	0.38	0.79	0.89	0.99	0.08	-

Table B-2.--Continued

Taxa		Station Numbers					
		13	14	15	16	17	18
Phylum: Rotifera (cont'd)							
Hexarthidae							
<u>Hexarthra</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Flosculariidae							
<u>Sinantherina</u>	I	-	-	-	-	-	-
	II	-	-	-		-	-
	III	-	-	-		-	-
Conochilidae							
<u>Conochiloides</u>	I	-	-	-	-	-	-
	II	-	-	-	0.04	-	-
	III	-	0.07	-	-	0.05	-
Bdelloidea							
Habrotrochidae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Philodinidae							
<u>Bdelloidea</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	0.02	0.02
	III	-	-	-	-	-	-
Family undetermined	I	-	0.07	-	0.08	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Eggs	I	2.26	3.34	9.14	3.69	0.72	2.04
	II	-	0.03	-	0.08	0.08	0.17
	III	0.23	0.27	0.08	0.14	0.11	-

Table B-2.--Continued

Taxa		Station Numbers					
		19	20	21	22	23	24
Phylum: Rotifera (cont'd)							
Hexarthidae							
<u>Hexarthra</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Flosculariidae							
<u>Sinantherina</u>	I	-	-	21.30	0.06	-	0.70
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Conochilidae							
<u>Conochiloides</u>	I	-	-	-	-	-	-
	II	-	-	0.04	-	-	-
	III	0.17	0.07	-	0.06	-	-
Bdelloidea							
Haorotrochidae							
Genus undetermined	I	-	-	1.09	-	-	-
	II	-	-	0.12	-	-	-
	III	-	-	-	-	-	-
Philodinidae							
<u>Bdelloidea</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.04	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	0.09	-	0.04	0.07	-	-
	III	-	-	-	-	-	-
Family undetermined	I	-	0.04	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Eggs	I	0.69	2.18	7.16	3.97	1.24	2.93
	II	1.01	0.16	0.20	0.79	0.03	0.81
	III	0.60	0.25	1.04	0.38	0.34	0.49

Table B-2.--Continued

Taxa		Station Numbers					
		25	26	27	28	29	30
Phylum: Rotifera (cont'd)							
Hexarthidae							
<u>Hexarthra</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Flosculariidae							
<u>Sinantherina</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Conochilidae							
<u>Conochiloides</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.12	0.19	0.11	0.50	-	0.07
Bdelloidea							
Habrotrochidae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.06	0.25	-	-
Philodinidae							
<u>Bdelloidea</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.13	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	0.07	-	-	-	-	-
	III	0.06	-	-	0.13	-	-
Family undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Eggs	I	4.11	2.13	0.23	0.41	0.38	0.84
	II	2.22	1.17	5.66	0.50	1.72	8.41
	III	0.42	0.57	0.56	0.63	0.85	0.15

Table B-2.--Continued

Taxa		Station Numbers					
		31	32	33	34	35	36
Phylum: Rotifera (cont'd)							
Hexarthidae							
Hexarthra	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Flosculariidae							
Sinantherina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Conochilidae							
Conochiloides	I	-	-	-	-	-	-
	II	-	-	5.75	-	0.09	-
	III	-	0.30	-	-	-	0.36
Bdelloidea							
Habrotrochidae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.37	-	-	-	0.22	-
Philodinidae							
Bdelloidea	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Family undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Eggs	I	1.28	1.41	0.25	1.33	3.46	0.18
	II	5.48	9.32	14.20	7.82	11.71	6.23
	III	-	0.05	-	-	0.07	0.18

Table B-2.--Continued

Taxa		Station Numbers					
		37	38	39	40	41	42
Phylum: Rotifera (cont'd)							
Hexarthidae							
Hexarthra	I	-	-	-	-	9.46	-
	II	0.11	-	0.13	-	-	-
	III	-	-	-	-	-	-
Flosculariidae							
Sinantherina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Conochilidae							
Conochiloides	I	-	-	-	-	11.96	1.14
	II	0.36	-	0.20	-	6.79	-
	III	-	-	-	-	39.43	0.40
Bdelloidea							
Habrotrochidae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	0.53	-
	III	-	-	-	-	-	-
Philodinidae							
Bdelloidea	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Family undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Eggs	I	1.42	0.05	0.25	0.62	28.38	2.14
	II	0.79	0.24	0.31	0.12	28.48	0.49
	III	0.15	0.07	-	0.23	8.35	0.20

Table B-2.--Continued

Taxa		Station Numbers			
		43	44	45	46
Phylum: Rotifera (cont'd)					
Hexarthidae					
Hexarthra	I	-	0.16	-	-
	II	-	-	-	-
	III	-	-	-	-
Flosculariidae					
Sinantherina	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Conochilidae					
Conochiloides	I	-	0.33	-	-
	II	-	0.07	-	-
	III	-	-	-	-
Bdelloidea					
Habrotrochidae					
Genus undetermined	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Philodinidae					
Bdelloidea	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Genus undetermined	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Family undetermined	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Eggs	I	0.47	1.31	0.82	0.26
	II	0.22	0.41	0.18	0.15
	III	0.15	0.18	-	0.10

Table B-3.--Estimated number (n/l) of Protozoa collected from the Alabama River with an 80-micron aperture Wisconsin plankton net.

Taxa		Station Numbers 1	2	3	4	5	6
Phylum: Protozoa (Rhizopoda)							
Testacealobosa							
Arcellidae							
Arcella	I	-	-	-	-	-	-
	II	0.05	-	0.01	-	0.23	0.14
	III	-	-	0.01	0.12	0.08	0.45
Centropyxidae							
Centropyxis	I	-	-	-	-	-	-
	II	0.21	-	-	0.05	0.15	0.30
	III	0.05	-	0.07	0.16	0.14	0.63
Difflugidae							
Difflugia	I	-	-	-	-	-	-
	II	0.25	0.06	0.91	0.19	0.96	0.30
	III	0.05	-	0.10	0.40	0.12	0.27
Testaceafilosa							
Euglyphidae							
Euglypha	I	-	-	-	-	-	-
	II	-	-	0.11	-	-	-
	III	-	-	-	-	-	-
Spirotrichida (Cilaphora)							
Tintinnidae							
Codonella	I	-	-	-	-	-	-
	II	-	-	0.07	-	0.03	-
	III	-	-	-	0.08	0.04	-

I=August 9-25, 1977, samples
II=September 19-October 4, 1977, samples
III=October 31-November 17, 1977, samples
"-"=not encountered in collection

NOTE: Due to a computation error, plankton concentrations in this table were underestimated. To obtain the correct concentration, all values should be divided by .694.

Table B-3.--Continued

Taxa		Station Numbers					
		7	8	9	10	11	12
Phylum: Protozoa (Rhizopoda)							
Testacealobosa							
Arcellidae							
<u>Arcella</u>	I	-	-	-	-	-	-
	II	0.19	-	0.03	-	-	0.09
	III	-	-	-	-	-	-
Centropyxidae							
<u>Centropyxis</u>	I	-	-	-	-	-	-
	II	-	0.09	0.02	0.02	0.05	-
	III	0.19	-	0.09	0.12	-	-
Difflugidae							
<u>Difflugia</u>	I	-	-	-	-	-	-
	II	0.19	0.09	1.04	0.12	2.10	2.56
	III	0.04	-	-	0.08	-	-
Testaceafilosa							
Euglyphidae							
<u>Euglypha</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Spirotrichida (Cilaphora)							
Tintinnidae							
<u>Codonella</u>	I	-	-	-	-	-	-
	II	-	-	0.05	-	-	-
	III	-	-	-	-	-	-

Table B-3.--Continued

Taxa		Station Numbers					
		13	14	15	16	17	18
Phylum: Protozoa (Rhizopoda)							
Testacealobosa							
Arcellidae							
Arcella	I	-	-	-	-	-	-
	II	-	-	-	-	0.08	-
	III	-	-	0.08	-	-	-
Centropyxidae							
Centropyxis	I	-	-	-	-	-	-
	II	-	-	-	0.04	-	0.02
	III	-	-	0.24	-	0.05	-
Difflugidae							
Difflugia	I	-	-	-	-	-	-
	II	0.99	0.24	0.35	0.31	0.15	0.08
	III	-	-	0.08	-	-	0.10
Testaceafilosa							
Euglyphidae							
Euglypha	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Spirotrichida (Cilaphora)							
Tintinnidae							
Codonella	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-3.--Continued

Taxa		Station Numbers					
		19	20	21	22	23	24
Phylum: Protozoa (Rhizopoda)							
Testacealobosa							
Arcellidae							
Arcella	I	0.10	-	-	-	-	-
	II	0.65	0.12	0.04	0.72	0.06	0.15
	III	-	-	0.05	-	0.09	-
Centropyxidae							
Centropyxis	I	-	-	-	-	-	-
	II	0.37	-	0.04	0.14	-	-
	III	-	0.11	0.11	0.06	0.26	0.49
Difflugidae							
Difflugia	I	0.02	-	1.56	-	-	0.56
	II	0.46	0.75	0.24	3.16	2.40	0.51
	III	-	-	0.05	-	-	-
Testaceafilosa							
Euglyphidae							
Euglypha	I	-	-	-	-	-	-
	II	-	-	-	-	0.20	-
	III	-	-	-	-	-	-
Spirotrichida (Cilaphora)							
Tintinnidae							
Codonella	I	-	-	-	-	-	-
	II	0.18	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-3.--Continued

Taxa		Station Numbers					
		25	26	27	28	29	30
Phylum: Protozoa (Rhizopoda)							
Testacealobosa							
Arcellidae							
Arcella	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.06	0.13	0.28	0.13	0.18	0.07
Centropyxidae							
Centropyxis	I	-	-	-	-	-	-
	II	0.06	0.14	-	0.08	-	-
	III	0.73	0.32	0.28	0.63	0.30	0.30
Difflugidae							
Difflugia	I	-	0.11	-	0.31	0.17	0.05
	II	0.29	0.07	0.11	0.59	0.06	0.36
	III	0.18	0.57	0.34	1.01	0.18	0.07
Testaceafilosa							
Euglyphidae							
Euglypha	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Spirotrichida (Cilaphora)							
Tintinnidae							
Codonella	I	-	-	-	-	-	-
	II	-	0.07	-	-	-	0.21
	III	0.06	-	-	-	-	-

Table B-3.--Continued

Taxa		Station Numbers					
		31	32	33	34	35	36
Phylum: Protozoa (Rhizopoda)							
Testacealobosa							
Arcellidae							
Arcella	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.05	-	-	-	-
Centropyxidae							
Centropyxis	I	-	-	-	-	-	-
	II	0.10	-	-	-	0.28	0.19
	III	-	0.05	0.06	-	-	0.12
Difflugidae							
Difflugia	I	0.35	0.23	-	-	0.14	0.18
	II	0.59	0.38	-	-	0.28	0.38
	III	-	-	-	-	-	-
Testaceafilosa							
Euglyphidae							
Euglypha	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Spirotrichida (Cilaphora)							
Tintinnidae							
Codonella	I	-	-	-	-	-	-
	II	0.10	-	-	-	0.19	-
	III	-	-	-	-	-	-

Table B-3.--Continued

Taxa		Station Numbers					
		37	38	39	40	41	42
Phylum: Protozoa (Rhizopoda)							
Testacealobosa							
Arcellidae							
Arcella	I	-	-	-	-	-	-
	II	-	0.03	-	-	-	-
	III	0.05	-	-	-	-	-
Centropyxidae							
Centropyxis	I	-	-	-	-	-	-
	II	-	0.03	0.04	0.06	-	-
	III	-	0.07	0.10	-	0.86	-
Difflugidae							
Difflugia	I	0.99	-	-	-	2.14	0.14
	II	0.18	0.07	0.31	0.03	4.79	0.24
	III	0.05	-	-	0.16	4.60	-
Testaceafilosa							
Euglyphidae							
Euglypha	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Spirotrichida (Cilaphora)							
Tintinnidae							
Codonella	I	-	-	-	-	-	-
	II	-	-	-	-	0.13	-
	III	-	-	-	-	0.86	-

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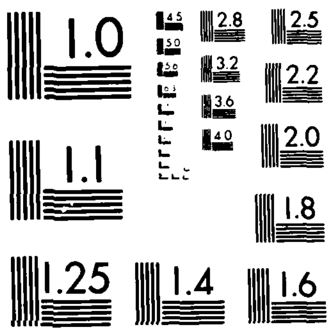

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Table B-3.--Continued

Taxa		Station Numbers			
		43	44	45	46
Phylum: Protozoa (Rhizopoda)					
Testacealobosa					
Arcellidae					
Arcella	I	-	-	-	-
	II	-	-	-	0.06
	III	0.07	-	-	-
Centropyxidae					
Centropyxis	I	-	-	-	-
	II	-	0.04	-	0.06
	III	0.15	-	-	-
Difflugidae					
Difflugia	I	0.05	-	-	-
	II	-	0.07	-	0.03
	III	-	-	-	0.10
Testaceafilosa					
Euglyphidae					
Euglypha	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Spirotrichida (Cilaphora)					
Tintinnidae					
Codonella	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-

Table B-4.--Estimated number (organisms/liter) of minor zooplankton taxa collected from the Alabama River with an 80-micron aperture Wisconsin plankton net.

Phylum: Arthropoda (Insecta)	
Ephemeroptera	
Ephemeridae	I: 3(0.09); II: 20(0.03), 23(0.06), 25(0.06), 26(0.78), 37(0.06), 38(0.07), 46(0.03); III: 19(0.09), 30(0.07)
Caeniidae	II: 12(0.03)
Heptigeniidae	III: 5(0.02), 43(0.07)
Tricorythidae	
Tricorythodes	III: 45(0.04)
Diptera	
Chironomidae	I: 25(0.04), 26(0.11), 30(0.05), 32(0.18), 37(0.07), II: 6(0.04), 11(0.05), 12(0.03), 24(0.22), 25 (0.06), 26(0.14), 27(0.54), 39(0.04), 46(0.15); III: 20(0.04), 23(0.09), 29(0.06)
Culicidae	
Chaoborus	I: 9(0.13), 15(0.09), 32(0.09), 35(0.14), 42 (0.14); II: 25(0.12), 27(0.22), 28(0.30), 29(0.11), 32(0.08), 43(0.06)
Genus undetermined	I: 35(0.14); II: 9(0.02), 31(0.20), 40(0.06), 41(0.13), 46(0.03)
Ceratopogonidae	II: 43(0.06), 46(0.03)
Simulidae	II: 20(0.09), 24(0.07), 37(0.03), 40(0.03), 46(0.03)
Phylum: Nematoda	
Rhabditidae	II: 5(0.06), 24(0.15), 38(0.03); III: 3(0.03), 4(0.08), 7(0.04), 29(0.06), 42(0.20)
Cephalobidae	III: 5(0.06), 30(0.07)
Family undetermined	III: 3(0.03), 6(0.09), 10(0.04), 28(0.13), 30 (0.07), 36(0.12)
Phylum: Pelecypoda	III: 1(0.09), 8(0.46), 9(0.27), 10(0.40), 11(0.36), 12(0.19), 13(0.06), 14(0.13), 18(0.05), 19(0.17), 20(0.07), 21(0.11), 23(0.17), 27(0.39), 37(0.05), 38(0.07), 41(0.29), 45(0.04), 46(0.05)

Explanation of I:3(0.09)--I = run number, 3 = station number, 0.09 = estimated number of organisms/liter of water sampled.

I=August 9-25, 1977, samples
II=September 19-October 4, 1977, samples
III=October 31-November 17, 1977, samples
"-"=not encountered in collection

NOTE: Due to a computation error, plankton concentrations in this table were underestimated. To obtain the correct concentration, all values should be divided by .694.

Table B-4.--Continued

Phylum: Gastrotricha	
Chaetonotidae	
Chaetonotus	II: 16(0.08)

Table B-5.--Estimated number (organisms/liter) of Chlorophyta collected from the Alabama River with an 80-micron aperture Wisconsin plankton net.

Taxa		Station Numbers 1	2	3	4	5	6
Division: Chlorophyta							
Chlorococcales							
Chlorococcaceae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	0.09	0.70	0.14
	III	0.32	-	-	-	-	-
Hydrodictaceae							
Pediastrum sp.	I	-	1.39	0.81	1.13	0.95	0.68
	II	-	-	0.15	-	0.03	0.27
	III	-	-	-	-	-	-
Pediastrum simplex	I	-	0.62	0.45	0.42	0.35	1.27
	II	1.15	0.44	2.22	0.11	0.61	0.81
	III	1.48	0.65	0.87	0.69	0.34	1.72
Hydrodictyon	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oocystaceae							
Trebaria	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Scenedesmaceae							
Scenedesmus	I	-	-	-	0.06	0.59	0.59
	II	0.02	-	1.71	-	0.03	-
	III	-	-	-	0.04	-	-
Coelastraceae							
Coelastrum	I	-	-	-	-	-	-
	II	-	-	0.15	-	-	-
	III	-	-	-	-	-	-
Cladophorales							
Cladophoraceae							
Cladophora	I	-	-	-	-	-	-
	II	0.68	0.12	0.15	0.14	0.09	0.17
	III	0.19	-	-	-	0.08	0.18
Rhizoclonium	I	-	-	-	-	-	-
	II	-	0.06	0.01	0.05	0.12	0.04
	III	-	-	-	-	-	-

I=August 9-25, 1977, samples
II=September 19-October 4, 1977, samples
III=October 31-November 17, 1977, samples
"-"=not encountered in collection
NOTE: Due to a computation error, plankton concentrations in this table were underestimated. To obtain the correct concentration, all values should be divided by .694.

Table B-5.--Continued

Taxa		Station Numbers					
		7	8	9	10	11	12
Division: Chlorophyta							
Chlorococcales							
Chlorococcaceae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	0.22	0.20
	III	-	-	-	-	0.08	-
Hydrodictaceae							
Pediastrum sp.	I	2.05	1.46	0.40	0.15	-	0.20
	II	0.06	-	-	0.02	0.05	0.12
	III	-	-	-	-	-	-
Pediastrum simplex	I	1.42	1.06	1.32	0.61	0.42	0.30
	II	1.26	-	0.29	0.37	0.86	1.67
	III	0.90	0.60	0.27	0.40	0.36	-
Hydrodictyon	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oocystaceae							
Trebaria	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Scenedesmaceae							
Scenedesmus	I	-	0.27	-	-	-	0.10
	II	-	-	0.08	0.02	-	-
	III	-	-	-	-	-	-
Coelastraceae							
Coelastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Cladophorales							
Cladophoraceae							
Cladophora	I	-	-	-	-	-	-
	II	0.06	-	-	0.02	-	-
	III	0.08	-	0.18	0.04	-	-
Rhizoclonium	I	-	-	-	-	-	-
	II	0.13	-	-	-	0.05	-
	III	0.04	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers 13	14	15	16	17	18
Division: Chlorophyta							
Chlorococcales							
Chlorococcaceae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Hydrodictaceae							
Pediastrum sp.	I	0.14	-	0.47	0.10	0.03	-
	II	0.05	-	-	-	-	-
	III	-	-	-	-	-	-
Pediastrum simplex	I	-	0.22	-	0.05	0.09	0.22
	II	0.16	-	0.44	0.19	0.11	0.21
	III	0.23	0.07	-	0.11	0.22	0.05
Hydrodictyon	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oocystaceae							
Trebaria	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Scenedesmaceae							
Scenedesmus	I	-	-	-	0.05	-	0.32
	II	0.05	0.03	-	-	-	-
	III	-	-	-	-	-	-
Coelastraceae							
Coelastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Cladophorales							
Cladophoraceae							
Cladophora	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.06	-	-	-	0.05	-
Rhizoclonium	I	-	-	-	-	-	-
	II	0.05	-	0.09	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers 19	20	21	22	23	24
Division: Chlorophyta							
Chlorococcales							
Chlorococcaceae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.17	-	-	0.19	-	-
Hydrodictaceae							
Pediastrum sp.	I	0.05	0.21	1.09	0.13	1.06	0.84
	II	0.18	-	-	1.22	0.26	-
	III	-	-	-	-	-	-
Pediastrum simplex	I	0.15	0.29	0.78	0.66	0.99	0.70
	II	15.78	2.06	0.32	42.13	5.20	2.05
	III	0.77	0.25	0.22	0.76	0.68	0.33
Hydrodictyon	I	-	-	-	-	-	-
	II	-	0.03	-	-	-	0.07
	III	-	0.04	-	-	-	-
Oocystaceae							
Trebaria	I	-	-	-	-	-	-
	II	0.09	-	-	-	-	-
	III	-	-	-	-	-	-
Scenedesmaceae							
Scenedesmus	I	-	-	0.78	0.46	0.66	-
	II	0.09	-	0.08	-	0.03	-
	III	-	-	-	-	-	-
Coelastraceae							
Coelastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Cladophorales							
Cladophoraceae							
Cladophora	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	0.09	0.16
Rhizoclonium	I	0.02	-	-	-	-	-
	II	-	-	-	-	-	0.15
	III	-	-	0.17	-	-	-

Table B-5.--Continued

Taxa		25	26	27	28	29	30
		Station Numbers					
Division: Chlorophyta							
Chlorococcales							
Chlorococcaceae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Hydrodictaceae							
<u>Pediastrum</u> sp.	I	0.90	0.22	0.29	0.34	0.31	0.98
	II	0.06	-	0.76	-	0.06	-
	III	-	-	-	0.13	0.12	0.07
<u>Pediastrum simplex</u>	I	1.35	1.23	1.32	0.79	1.52	3.24
	II	1.70	2.62	19.15	2.18	23.90	43.00
	III	0.24	2.02	-	0.38	2.12	1.41
<u>Hydrodictyon</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.06	-	0.06	-	-	0.07
Oocystaceae							
<u>Trebaria</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Scenedesmaceae							
<u>Scenedesmus</u>	I	-	0.11	0.23	0.38	0.24	0.52
	II	-	-	-	0.08	-	-
	III	-	-	-	-	-	-
Coelastraceae							
<u>Coelastrum</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Cladophorales							
Cladophoraceae							
<u>Cladophora</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.06	-	0.13	-	-
<u>Rhizoclonium</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		31	32	33	34	35	36
Division: Chlorophyta							
Cnlorococcales							
Chlorococcaceae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Hydrodictaceae							
Pediastrum sp.	I	0.43	0.41	0.50	-	-	-
	II	0.10	0.23	0.34	-	0.28	2.46
	III	-	-	-	-	-	-
Pediastrum simplex	I	5.17	1.00	2.49	0.89	1.25	0.54
	II	22.40	13.52	26.38	14.21	15.58	61.19
	III	0.52	0.71	0.45	1.15	0.44	1.09
Hydrodictyon	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oocystaceae							
Trebaria	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Scenedesmaceae							
Scenedesmus	I	0.04	1.28	0.62	-	-	-
	II	1.86	0.08	-	-	-	-
	III	-	-	-	-	-	-
Coelastraceae							
Coelastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Cladophorales							
Cladophoraceae							
Cladophora	I	-	-	0.89	-	-	-
	II	-	-	-	-	-	-
	III	-	0.05	-	-	-	-
Rhizoclonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	0.07	-

Table B-5.--Continued

Taxa		Station Numbers					
		37	38	39	40	41	42
Division: Chlorophyta							
Chlorococcales							
Chlorococcaceae							
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.10	-	-	-	-	-
Hydrodictaceae							
Pediastrum sp.	I	0.71	0.05	-	-	0.36	0.28
	II	-	-	-	-	0.27	-
	III	0.05	-	-	-	-	-
Pediastrum simplex	I	2.69	0.64	0.41	0.93	5.36	1.57
	II	1.91	1.08	2.18	1.94	3.59	0.81
	III	0.36	0.92	0.70	0.39	1.73	0.10
Hydrodictyon	I	-	-	-	-	-	-
	II	0.03	-	-	-	-	-
	III	-	-	-	-	-	-
Oocystaceae							
Trebaria	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Scenedesmaceae							
Scenedesmus	I	0.42	0.34	0.08	-	0.89	0.57
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Coelastraceae							
Coelastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Cladophorales							
Cladophoraceae							
Cladophora	I	-	-	-	-	-	-
	II	-	0.07	-	-	-	-
	III	-	-	-	-	-	-
Rhizoclonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers			
		43	44	45	46
Division: Chlorophyta					
Chlorococcales					
Chlorococcaceae					
Genus un-determined	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Hydrodictaceae					
<u>Pediastrum</u> sp.	I	-	-	-	-
	II	0.06	-	-	0.03
	III	-	-	-	-
<u>Pediastrum simplex</u>	I	0.10	0.98	-	0.79
	II	1.10	1.33	0.[illegible]	0.75
	III	0.44	0.22	0.1	0.25
<u>Hydrodictyon</u>	I	-	-	-	-
	II	-	-	-	-
	III	0.07	-	-	-
Oocystaceae					
<u>Trebaria</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Scenedesmaceae					
<u>Scenedesmus</u>	I	0.05	0.16	-	0.26
	II	-	-	-	-
	III	-	-	-	-
Coelastraceae					
<u>Coelastrum</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Cladophorales					
Cladophoraceae					
<u>Cladophora</u>	I	-	-	0.20	-
	II	-	-	-	-
	III	-	-	-	-
<u>Rhizoclonium</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		1	2	3	4	5	6
Division: Chlorophyta (cont'd)							
Ulotrichales							
Ulotrichaceae							
Ulothrix	I	-	0.93	0.09	0.12	0.24	-
	II	0.07	-	0.01	-	0.03	-
	III	-	-	0.10	0.08	-	-
Chaetophoraceae							
Stigeoclonium	I	-	0.31	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygnematales							
Desmidiaceae							
Closterium	I	-	0.31	-	-	-	-
	II	-	-	0.11	-	0.03	-
	III	-	-	0.10	-	-	0.09
Cosmarium	I	-	-	-	-	0.12	-
	II	0.02	-	0.11	-	-	0.04
	III	-	-	-	-	-	-
Micrasterias	I	-	-	-	-	0.35	-
	II	-	-	-	-	-	0.10
	III	-	-	-	-	-	-
Staurastrum	I	-	-	-	-	-	-
	II	-	-	0.29	-	-	0.04
	III	-	-	0.03	-	-	-
Euastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	0.09
Xanthidium	I	-	-	-	-	-	-
	II	-	-	-	-	-	0.04
	III	-	-	-	-	-	-
Pleurotaenium	I	-	-	-	-	-	-
	II	-	-	0.07	-	-	-
	III	-	-	-	-	-	-
Desmidium	I	-	-	-	-	-	-
	II	-	-	-	-	0.09	0.17
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers 1	2	3	4	5	6
Division: Chlorophyta (cont'd)							
Ulotrichales							
Ulotrichaceae							
<u>Ulothrix</u>	I	-	0.93	0.09	0.12	0.24	-
	II	0.07	-	0.01	-	0.03	-
	III	-	-	0.10	0.08	-	-
Chaetophoraceae							
<u>Stigeoclonium</u>	I	-	0.31	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygnematales							
Desmidiaceae							
<u>Closterium</u>	I	-	0.31	-	-	-	-
	II	-	-	0.11	-	0.03	-
	III	-	-	0.10	-	-	0.09
<u>Cosmarium</u>	I	-	-	-	-	0.12	-
	II	0.02	-	0.11	-	-	0.04
	III	-	-	-	-	-	-
<u>Micrasterias</u>	I	-	-	-	-	0.35	-
	II	-	-	-	-	-	0.10
	III	-	-	-	-	-	-
<u>Staurastrum</u>	I	-	-	-	-	-	-
	II	-	-	0.29	-	-	0.04
	III	-	-	0.03	-	-	-
<u>Euastrum</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	0.09
<u>Xanthidium</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	0.04
	III	-	-	-	-	-	-
<u>Pleurotaenium</u>	I	-	-	-	-	-	-
	II	-	-	0.07	-	-	-
	III	-	-	-	-	-	-
<u>Desmidium</u>	I	-	-	-	-	-	-
	II	-	-	-	-	0.09	0.17
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		7	8	9	10	11	12
Division: Chlorophyta (cont'd)							
Ulotrichales							
Ulotrichaceae							
Ulothrix	I	-	-	-	-	-	-
	II	-	-	0.02	-	-	-
	III	-	-	-	-	-	-
Chaetophoraceae							
Stigeoclonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygnematales							
Desmidiaceae							
Closterium	I	-	-	-	-	-	-
	II	-	0.09	0.02	-	0.05	-
	III	-	-	-	-	-	-
Cosmarium	I	-	-	-	-	-	-
	II	-	-	-	0.02	0.16	-
	III	-	-	-	-	-	-
Micrasterias	I	-	-	-	-	-	-
	II	0.06	-	-	-	-	-
	III	-	-	-	-	-	-
Staurastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Euastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Xanthidium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleurotaenium	I	-	-	-	-	-	-
	II	0.06	-	-	-	0.05	-
	III	-	-	-	-	-	-
Desmidium	I	-	-	-	-	-	-
	II	-	-	-	0.02	0.05	0.03
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		13	14	15	16	17	18
Division: Chlorophyta (cont'd)							
Ulotrichales							
Ulotrichaceae							
Ulothrix	I	-	-	-	-	-	-
	II	-	-	-	-	0.02	-
	III	-	-	0.08	-	-	-
Chaetophoraceae							
Stigeoclonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygnematales							
Desmidiaceae							
Closterium	I	-	-	-	-	-	-
	II	0.16	-	-	-	-	0.02
	III	-	-	-	-	-	-
Cosmarium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Micrasterias	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Staurastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Euastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Xanthidium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleurotaenium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Desmidium	I	-	-	-	-	-	-
	II	-	-	-	-	-	0.02
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		19	20	21	22	23	24
Division: Chlorophyta (cont'd)							
Ulotrichales							
Ulotrichaceae							
Ulothrix	I	0.02	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	0.06	-	0.16
Chaetophoraceae							
Stigeoclonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygnematales							
Desmidiaceae							
Closterium	I	0.02	-	-	0.40	-	-
	II	-	0.19	-	-	-	0.15
	III	-	0.04	0.05	-	0.09	-
Cosmarium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Micrasterias	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Staurastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Euastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Xanthidium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleurotaenium	I	-	-	-	-	-	-
	II	-	-	-	-	-	0.07
	III	-	-	-	-	-	-
Desmidium	I	-	-	-	-	-	-
	II	0.02	0.09	-	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		25	26	27	28	29	30
Division: Chlorophyta (cont'd)							
Ulotrichales							
Ulotrichaceae							
Ulothrix	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	0.06	0.13	-	-
Chaetophoraceae							
Stigeoclonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygnematales							
Desmidiaceae							
Closterium	I	-	-	-	0.03	-	-
	II	0.06	0.14	-	-	-	-
	III	-	-	-	0.13	-	-
Cosmarium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Micrasterias	I	-	-	-	-	-	-
	II	0.12	-	-	-	-	-
	III	-	-	-	-	-	-
Staurastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.32	-	0.38	0.06	0.15
Euastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Xanthidium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleurotaenium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Desmidium	I	-	-	-	-	-	-
	II	0.06	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		31	32	33	34	35	36
Division: Chlorophyta (cont'd)							
Ulotrichales							
Ulotrichaceae							
Ulothrix	I	-	0.05	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Chaetophoraceae							
Stigeoclonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygnematales							
Desmidiaceae							
Closterium	I	-	-	-	-	-	-
	II	0.10	-	-	-	-	-
	III	-	-	-	-	-	-
Cosmarium	I	-	0.09	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Micrasterias	I	-	-	-	-	-	-
	II	0.08	-	-	-	0.09	-
	III	-	-	-	-	-	-
Staurastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.07	-	-	-	-	-
Euastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Xanthidium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleurotaenium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Desmidium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers 37	38	39	40	41	42
Division: Chlorophyta (cont'd)							
Ulotrichales							
Ulotrichaceae							
Ulothrix	I	-	-	-	-	-	-
	II	-	-	-	0.03	-	-
	III	-	-	-	-	-	-
Chaetophoraceae							
Stigeoclonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygnematales							
Desmidiaceae							
Closterium	I	0.14	-	-	-	-	-
	II	-	-	-	0.09	-	-
	III	-	-	-	-	-	-
Cosmarium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Micrasterias	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Staurastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.05	-	-	-	-	-
Euastrum	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Xanthidium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleurotaenium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Desmidium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers 43	44	45	46
Division: Chlorophyta (cont'd)					
Ulotrichales					
Ulotrichaceae					
<u>Ulothrix</u>	I	-	-	-	-
	II	-	-	-	-
	III	0.07	-	-	-
Chaetophoraceae					
<u>Stigeoclonium</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Zygnematales					
Desmidiaceae					
<u>Closterium</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	0.04	-	-
<u>Cosmarium</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
<u>Micrasterias</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
<u>Staurastrum</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
<u>Euastrum</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
<u>Xanthidium</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
<u>Pleurotaenium</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
<u>Desmidium</u>	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		1	2	3	4	5	6
Division: Chlorophyta (cont'd)							
Zygnemataceae							
Spirogyra	I	-	2.01	0.09	-	0.35	1.10
	II	0.01	-	0.11	0.24	0.12	0.57
	III	0.14	-	0.03	0.04	0.02	-
Mougeotia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygonema	I	-	-	-	-	-	-
	II	-	-	0.01	-	-	-
	III	-	-	-	-	-	-
Oedogoniales							
Oedogoniaceae							
Oedogonium	I	-	-	-	-	-	-
	II	0.29	-	0.01	0.05	-	-
	III	0.09	-	-	-	0.04	0.18
Volvocales							
Volvocaceae							
Gonium	I	-	0.15	-	0.18	1.36	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pandorina	I	-	-	-	-	-	0.76
	II	-	0.03	1.67	0.14	-	0.57
	III	-	-	-	-	-	-
Eudorina	I	-	-	-	-	-	-
	II	0.02	-	0.25	0.33	0.06	0.81
	III	-	-	-	-	-	-
Platydorina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleodorina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Volvox	I	-	-	-	-	-	-
	II	-	-	-	-	-	0.04
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		7	8	9	10	11	12
Division: Chlorophyta (cont'd)							
Zygnemataceae							
Spirogyra	I	0.95	-	-	0.15	-	-
	II	0.76	0.53	0.13	0.12	0.65	0.75
	III	0.02	-	-	0.08	0.04	0.13
Mougeotia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygonema	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oedogoniales							
Oedogoniaceae							
Oedogonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Volvocales							
Volvocaceae							
Gonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pandorina	I	-	0.80	0.40	0.46	-	0.79
	II	0.50	0.09	-	0.10	0.22	-
	III	0.04	-	-	-	-	-
Eudorina	I	-	-	-	-	-	-
	II	-	0.09	0.02	-	0.11	0.09
	III	0.04	-	-	-	-	-
Platydorina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleodorina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Volvox	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		13	14	15	16	17	18
Division: Chlorophyta (cont'd)							
Zygnemataceae							
Spirogyra	I	0.42	0.22	0.56	0.05	0.11	0.11
	II	0.31	-	0.53	0.08	0.06	0.31
	III	-	-	-	0.04	0.05	-
Mougeotia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Zygonema	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oedogoniales							
Oedogoniaceae							
Oedogonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Volvocales							
Volvocaceae							
Gonium	I	-	-	-	0.05	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pandorina	I	0.14	0.43	0.28	-	-	-
	II	-	-	-	0.04	0.02	-
	III	-	-	-	-	-	-
Eudorina	I	-	0.11	-	1.59	1.38	0.43
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Platydorina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleodorina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Volvox	I	-	-	-	-	-	0.11
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		19	20	21	22	23	24
Division: Chlorophyta (cont'd)							
Zygnemataceae							
Spirogyra	I	0.17	0.08	0.16	0.40	0.66	-
	II	0.83	0.09	0.20	0.07	-	2.05
	III	0.17	0.07	0.11	0.25	0.43	0.33
Mougeotia	I	-	-	-	-	-	-
	II	-	-	0.08	-	-	-
	III	0.09	0.11	-	0.06	0.26	0.33
Zygonema	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oedogoniales							
Oedogoniaceae							
Oedogonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Volvocales							
Volvocaceae							
Gonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pandorina	I	0.70	-	-	1.26	-	-
	II	-	-	0.04	-	-	-
	III	-	-	-	-	-	-
Eudorina	I	1.35	0.12	-	3.84	19.68	0.84
	II	1.01	-	0.04	-	-	0.07
	III	-	-	-	-	-	-
Platydorina	I	-	-	-	0.13	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleodorina	I	-	-	-	-	-	-
	II	0.09	-	-	-	-	-
	III	-	-	-	-	-	-
Volvox	I	-	-	-	-	-	-
	II	0.28	0.03	-	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		25	26	27	28	29	30
		Station Numbers					
Division: Chlorophyta (cont'd)							
Zygnemataceae							
Spirogyra	I	-	0.22	0.06	-	-	-
	II	0.82	1.24	0.33	-	0.59	0.21
	III	0.30	0.25	0.56	0.13	0.61	0.30
Mougeotia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.25	0.17	0.38	0.49	0.15
Zygonema	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oedogoniales							
Oedogoniaceae							
Oedogonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	0.12	-
Volvocales							
Volvocaceae							
Gonium	I	-	-	-	-	0.10	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pandorina	I	0.18	-	-	-	-	1.59
	II	-	-	0.33	-	-	0.46
	III	-	-	-	-	-	-
Eudorina	I	2.75	23.60	5.20	8.88	7.38	19.60
	II	0.12	-	1.20	-	2.72	23.88
	III	-	-	0.06	-	-	-
Platydorina	I	-	-	-	0.21	0.10	0.66
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleodorina	I	-	-	-	-	-	0.32
	II	-	-	0.11	-	-	-
	III	-	-	-	-	-	-
Volvox	I	-	-	-	-	-	0.05
	II	-	-	0.22	-	-	0.92
	III	-	-	-	-	0.06	-

Table B-5.--Continued

Taxa		Station Numbers					
		31	32	33	34	35	36
Division: Chlorophyta (cont'd)							
Zygnemataceae							
Spirogyra	I	0.08	0.09	-	-	-	-
	II	0.39	1.23	0.34	-	0.85	0.94
	III	-	-	0.06	-	0.07	-
Mougeotia	I	-	-	-	-	-	-
	II	0.10	-	-	-	-	-
	III	-	-	-	-	-	-
Zygonema	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oedogoniales							
Oedogoniaceae							
Oedogonium	I	-	-	-	-	-	-
	II	0.10	-	-	.	-	-
	III	-	-	-	-	-	-
Volvocales							
Volvocaceae							
Gonium	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pandorina	I	1.09	1.78	0.87	3.55	0.55	-
	II	0.10	0.08	4.73	2.13	2.83	1.32
	III	-	-	-	-	-	-
Eudorina	I	0.54	0.82	0.62	-	-	-
	II	5.18	6.49	1.01	-	1.04	2.27
	III	-	-	-	-	-	-
Platydorina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Pleodorina	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Volvox	I	-	-	-	-	-	-
	II	-	-	0.34	-	-	0.19
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Numbers					
		37	38	39	40	41	42
Division: Chlorophyta (cont'd)							
Zygnemataceae							
<u>Spirogyra</u>	I	0.35	0.15	0.25	0.31	-	0.14
	II	0.25	0.20	0.31	0.18	-	0.08
	III	-	-	-	-	-	-
<u>Mougeotia</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
<u>Zygonema</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oedogoniales							
Oedogoniaceae							
<u>Oedogonium</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Volvocales							
Volvocaceae							
<u>Gonium</u>	I	-	-	-	-	-	-
	II	-	-	-	0.06	-	-
	III	-	-	-	-	-	-
<u>Pandorina</u>	I	2.34	6.91	2.63	0.77	2.50	5.86
	II	-	-	0.04	0.12	-	-
	III	-	-	-	-	-	-
<u>Eudorina</u>	I	6.30	0.74	0.49	-	0.36	0.14
	II	0.56	0.24	0.74	0.03	0.27	0.08
	III	0.05	-	-	-	-	-
<u>Platydorina</u>	I	0.14	0.05	0.25	-	-	0.71
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
<u>Pleodorina</u>	I	-	-	-	-	-	-
	II	-	-	0.13	-	-	-
	III	-	-	-	-	-	-
<u>Volvox</u>	I	-	-	-	-	-	-
	II	0.03	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-5.--Continued

Taxa		Station Number			
		43	44	45	46
Division: Chlorophyta (cont'd)					
Zygnemataceae					
Spirogyra	I	0.21	0.33	1.23	-
	II	0.11	0.07	0.12	0.39
	III	-	-	-	-
Mougeotia	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Zygnema	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Oedogoniales					
Oedogoniaceae					
Oedogonium	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Volvocales					
Volvocaceae					
Gonium	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Pandorina	I	1.67	1.63	0.20	0.52
	II	-	0.04	0.05	-
	III	-	-	-	-
Eudorina	I	0.36	0.81	0.62	-
	II	-	0.04	-	0.12
	III	-	-	-	-
Platydorina	I	0.05	0.16	-	-
	II	-	-	-	-
	III	-	-	-	-
Pleodorina	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Volvox	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-

Table B-6.--Estimated numbers (organisms/liter) of diatoms collected from the Alabama River with an 80-micron aperture Wisconsin plankton net during the period of October 31-November 17, 1977

Taxa	Station Numbers 1	2	3	4	5	6
Division: Chrysophyta (Bacillariophyceae)						
Centrales						
Coscinodiscaceae						
<u>Melosira</u>	6.40	4.55	3.08	25.58	6.72	4.17
<u>Cyclotella</u>	1.60	1.65	1.93	0.47	0.23	-
Chaetoceraceae						
<u>Attheya</u>	0.53	0.41	-	-	-	-
Anaulaceae						
<u>Terpsinoe</u>	2.67	4.13	1.16	1.40	1.85	0.52
Pennales						
Tabellariaceae						
<u>Tabellaria</u>	-	-	-	-	0.23	-
Meridionaceae						
<u>Meridion</u>	-	-	-	-	0.46	-
Diatomaceae						
<u>Diatoma</u>	-	-	-	-	0.46	-
Fragilariaceae						
<u>Fragilaria</u>	-	-	5.39	-	-	2.09
<u>Synedra</u>	-	-	-	-	0.23	-
Achnanthaceae						
<u>Cocconeis</u>	-	-	-	-	0.23	-
Naviculariaceae						
<u>Navicula</u>	-	-	-	-	-	-
<u>Gyrosigma</u>	-	-	-	0.47	0.23	-
<u>Stauroneis</u>	-	-	-	-	-	-
<u>Pinnularia</u>	-	-	-	-	0.46	-
Gomphonemataceae						
<u>Gomphonema</u>	-	-	-	-	0.46	-
Cymbellaceae						
<u>Cymbella</u>	-	-	-	-	0.23	-
Nitzchiaceae						
<u>Nitzschia</u>	-	-	-	-	-	-
Surirellaceae						
<u>Surirella</u>	-	-	0.39	-	-	-
Family undetermined	0.53	-	-	1.86	-	-

NOTE: Due to a computation error, plankton concentrations in this table were underestimated. To obtain the correct concentration, all values should be divided by .694.

Table B-6.--Continued

Taxa	Station Numbers					
	7	8	9	10	11	12
Division: Chrysophyta (Bacillariophyceae)						
Centrales						
Coscinodiscaceae						
Melosira	8.63	4.53	8.27	6.15	3.43	1.10
Cyclotella	0.43	-	-		-	-
Chaetoceraceae						
Attheya	-	-	-		-	-
Anaulaceae						
Terpsinoe	0.43	1.06	1.03	0.23	-	-
Pennales						
Tabellariaceae						
Tabellaria	-	-	-	-	-	-
Meridionaceae						
Meridion	-	-	-	-	-	-
Diatomaceae						
Diatoma	-	-	-	-	-	-
Fragilariaceae						
Fragilaria	-	-	-	-	-	-
Synedra	-	-	-	-	-	-
Achnanthacea						
Cocconeis	-	-	-	-	-	-
Naviculariaceae						
Navicula	-	-	-	-	-	-
Gyrosigma	-	-	-	-	-	-
Stauroneis	-	-	-	-	-	-
Pinnularia	-	-	-	-	-	-
Gomphonemataceae						
Gomphonema	-	-	-	-	-	0.37
Cymbellaceae						
Cymbella	-	-	-	-	-	-
Nitzchiaceae						
Nitzschia	0.43	-	-	0.23	-	-
Surirellaceae						
Surirella	-	-	-	0.23	-	-
Family undetermined	-	-	-	0.23	-	0.74

Table B-6.--Continued

Taxa	Station Numbers					
	13	14	15	16	17	18
Division: Chrysophyta (Bacillariophyceae)						
Centrales						
Coscinodiscaceae						
Melosira	1.96	7.68	8.84	0.83	3.42	1.70
Cyclotella		-	-	-	-	-
Chaetoceraceae						
Attheya		-	-	-	-	-
Anaulaceae						
Terpsinoe	0.33	-	-	-	-	-
Pennales						
Tabellariaceae						
Tabellaria	-	-	0.47	-	-	-
Meridionaceae						
Meridion	-	-	-	-	-	-
Diatomaceae						
Diatoma	-	0.76	0.93	-	0.31	-
Fragilariaceae						
Fragilaria	-	-	1.40	-	1.55	-
Synedra	-	-	-	-	-	0.28
Achnanthacea						
Cocconeis	-	-	-	-	0.31	-
Naviculariaceae						
Navicula	-	-	0.93	-	0.31	-
Gyrosigma	-	-	-	-	-	-
Stauroneis	-	-	-	-	-	-
Pinnularia	-	-	-	-	0.31	-
Gomphonemataceae						
Gomphonema	-	-	-	-	-	-
Cymbellaceae						
Cymbella	-	-	0.47	-	-	0.28
Nitzchiaceae						
Nitzschia	-	-	0.93	-	-	-
Surirellaceae						
Surirella	-	-	-	0.21	-	-
Family undetermined	0.33	0.38	-	-	0.31	0.85

Table B-6.--Continued

Taxa	Station Numbers					
	19	20	21	22	23	24
Division: Chrysophyta (Bacillariophyceae)						
Centrales						
Coscinodiscaceae						
Melosira	2.95	3.63	0.64	1.45	1.47	1.89
Cyclotella	-	-	-	-	-	-
Chaetoceraceae						
Attheya	-	-	-	-	-	-
Anaulaceae						
Terpsinoe	2.46	0.20	-	0.36	1.96	-
Pennales						
Tabellariaceae						
Tabellaria	-	-	-	-	0.49	-
Meridionaceae						
Meridion	-	0.40	-	-	-	-
Diatomaceae						
Diatoma	-	-	-	-	0.98	-
Fragilariaceae						
Fragilaria	-	-	0.32	-	0.98	-
Synedra	0.98	0.20	-	-	0.49	0.95
Achnanthacea						
Cocconeis	-	-	-	-	-	-
Naviculariaceae						
Navicula	-	-	-	-	0.49	-
Gyrosigma	-	-	-	-	-	-
Stauroneis	-	-	-	-	-	-
Pinnularia	-	-	-	-	-	-
Gomphonemataceae						
Gomphonema	-	-	-	-	-	-
Cymbellaceae						
Cymbella	-	-	-	-	-	-
Nitzchiaceae						
Nitzschia	-	-	-	-	4.42	-
Surirellaceae						
Surirella	-	-	-	0.36	-	-
Family undetermined	-	0.20	0.32	-	0.98	-

Table B-6.--Continued

Taxa	Station Numbers					
	25	26	27	28	29	30
Division: Chrysophyta (Bacillariophyceae)						
Centrales						
Coscinodiscaceae						
Melosira	0.70	3.62	1.62	17.37	2.44	8.53
Cyclotella	-	-	-	-	-	-
Chaetoceraceae						
Attheya	-	-	-	-	-	-
Anaulaceae						
Terpsinoe	-	0.36	0.97	0.72	0.70	2.56
Pennales						
Tabellariaceae						
Tabellaria	-	0.72	-	-	-	-
Meridionaceae						
Meridion	-	-	-	-	-	-
Diatomaceae						
Diatoma	-	0.72	-	-	-	-
Fragilariaceae						
Fragilaria	-	0.36	5.17	3.62	1.40	0.85
Synedra	-	0.72	-	-	-	-
Achnanthacea						
Cocconeis	-	-	-	-	-	-
Naviculariaceae						
Navicula	-	0.36	-	-	-	-
Gyrosigma	-	0.36	-	-	0.35	-
Stauroneis	-	-	-	0.72	-	-
Pinnularia	-	-	-	-	-	-
Gomphonemataceae						
Gomphonema	-	-	-	-	-	-
Cymbellaceae						
Cymbella	-	-	-	-	-	
Nitzchiaceae						
Nitzschia	-	-	0.97	-	-	0.85
Surirellaceae						
Surirella	-	0.36	0.65	0.72	0.70	0.43
Family undetermined	0.35	-	-	-	0.35	-

Table B-6.--Continued

Taxa	Station Numbers					
	31	32	33	34	35	36
Division: Chrysophyta (Bacillariophyceae)						
Centrales						
Coscinodiscaceae						
Melosira	13.22	16.65	18.40	14.89	3.81	20.49
Cyclotella	-	0.29	-	-	-	-
Chaetoceraceae						
Attheya	-	-	-	-	-	-
Anaulaceae						
Terpsinoe	0.43	-	-	-	-	-
Pennales						
Tabellariaceae						
Tabellaria	-	-	-	-	-	-
Meridionaceae						
Meridion	-	-	-	-	-	-
Diatomaceae						
Diatoma	-	-	-	-	-	-
Fragilariaceae						
Fragilaria	0.85	-	1.10	-	0.42	1.39
Synedra	-	-	-	-	-	-
Achnanthacea						
Cocconeis	-	-	-	-	-	-
Naviculariaceae						
Navicula	-	-	-	-	0.85	-
Gyrosigma	-	-	-	-	-	-
Stauroneis	-	-	-	-	-	-
Pinnularia	-	-	-	-	-	-
Gomphonemataceae						
Gomphonema	-	-	-	-	-	-
Cymbellaceae						
Cymbella	-	-	-	-	-	-
Nitzchiaceae						
Nitzschia	0.43	-	-	-	-	-
Surirellaceae						
Surirella	-	-	-	-	0.42	0.35
Family undetermined	-	-	-	-	-	0.35

Table B-6.--Continued

Taxa	Station numbers					
	37	38	39	40	41	42
Division: Chrysophyta (Bacillariophyceae)						
Centrales						
Coscinodiscaceae						
Melosira	6.19	15.02	6.95	14.84	79.43	6.26
Cyclotella	-	-	-	-	-	-
Chaetoceraceae						
Attheya	-	-	-	-	-	-
Anaulaceae						
Terpsinoe	0.29	0.41	-	-	-	0.57
Pennales						
Tabellariaceae						
Tabellaria	-	-	-	-	-	-
Meridionaceae						
Meridion	-	-	-	-	-	-
Diatomaceae						
Diatoma	-	-	-	-	-	-
Fragilariaceae						
Fragilaria	0.29	-	0.58	-	-	-
Synedra	-	-	-	-	-	-
Achnanthacea						
Cocconeis	-	-	-	-	-	-
Naviculariaceae						
Navicula	-	0.41	-	-	-	-
Gyrosigma	-	-	-	-	-	-
Stauroneis	-	-	-	-	-	-
Pinnularia	-	-	-	-	-	-
Gomphonemataceae						
Gomphonema	-	-	-	-	-	-
Cymbellaceae						
Cymbella	-	-	-	-	-	-
Nitzchiaceae						
Nitzschia	-	-	-	-	1.65	-
Surirellaceae						
Surirella	-	-	-	-	-	-
Family undetermined	-	-	-	-	-	-

Table B-6.--Continued

Taxa	Station Numbers			
	43	44	45	46
Division: Chrysophyta (Bacillariophyceae)				
Centrales				
Coscinodiscaceae				
Melosira	10.09	2.28	1.27	1.99
Cyclotella	-	-	-	-
Chaetoceraceae				
Attheya	-	-	-	-
Anaulaceae				
Terpsinoe	-	-	-	0.28
Pennales				
Tabellariaceae				
Tabellaria	-	-	-	-
Meridionaceae				
Meridion	-	-	-	-
Diatomaceae				
Diatoma	-	-	-	-
Fragilariaceae				
Fragilaria	0.42	-	-	-
Synedra	-	-	-	-
Achnanthacea				
Cocconeis	-	-	-	-
Naviculariaceae				
Navicula	-	-	-	-
Gyrosigma	0.42	-	-	-
Stauroneis	-	-	-	-
Pinnularia	-	-	-	-
Gomphonemataceae				
Gomphonema	-	0.21	-	-
Cymbellaceae				
Cymbella	-	-	-	-
Nitzchiaceae				
Nitzschia	-	-	-	0.28
Surirellaceae				
Surirella	-	-	-	-
Family undetermined	-	-	-	-

Table B-7.--Estimated number (organisms/liter) of cyanophytes collected from the Alabama River with an 80-micron aperture Wisconsin plankton net.

Taxa		Station Numbers 1	2	3	4	5	6
Division: Cyanophyta							
Chroococcaceae							
Merismopedia	I	-	-	-	-	-	-
	II	-	0.03	0.22	0.09	0.03	0.07
	III	-	-	-	-	0.02	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	0.01	-	-	0.10
	III	-	-	-	-	-	-
Oscillatoriaceae							
Arthrospira	I	-	-	-	-	0.18	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lyngbya	I	-	-	0.26	-	-	-
	II	-	0.03	0.07	-	0.12	-
	III	0.05	0.72	0.13	0.04	0.46	0.09
Oscillatoria	I	-	1.70	1.26	-	1.54	0.68
	II	0.36	0.03	1.57	1.79	0.09	0.71
	III	-	0.04	0.03	0.08	-	-
Nostoceaceae							
Anabaena	I	-	0.46	0.18	2.45	1.30	1.19
	II	-	-	-	-	0.03	0.04
	III	-	-	-	-	-	-
Nodularia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Hammatoideaceae							
Rhaphidiopsis	I	-	-	-	-	-	0.08
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Stigonemataceae							
Stigonema	I	-	-	-	-	-	-
	II	0.05	-	-	-	-	-
	III	0.05	-	-	0.08	0.04	-
Dermocarpaceae							
Stichosiphon	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.14	-	-	-	-	-

I=August 9-25, 1977, samples
II=September 19-October 4, 1977, samples
III=October 31-November 17, 1977, samples
"-" = not encountered in collection
NOTE: Due to a computation error, plankton concentrations in this table were underestimated. To obtain the correct concentration, all values should be divided by .694.

Table B-7.--Continued

Taxa		Station Numbers					
		7	8	9	10	11	12
Division: Cyanophyta							
Chroococcaceae							
Merismopedia	I	-	-	-	-	-	-
	II	-	-	-	-	0.05	0.03
	III	-	-	0.09	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	0.13	-	0.02	-	-	-
	III	-	-	-	-	-	-
Oscillatoriaceae							
Arthrospira	I	0.16	-	-	-	-	-
	II	-	0.53	-	-	-	-
	III	-	-	-	-	-	-
Lyngbya	I	-	0.13	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	0.08	-	-
Oscillatoria	I	-	0.13	-	0.15	-	-
	II	0.44	-	-	0.17	0.05	0.37
	III	-	-	-	0.04	-	0.06
Nostoceaceae							
Anabaena	I	-	-	-	-	-	-
	II	0.13	-	-	0.02	-	-
	III	-	-	-	-	-	-
Nodularia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Hammatoideaceae							
Rhaphidiopsis	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Stigonemataceae							
Stigonema	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Dermocarpaceae							
Stichosiphon	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-7.--Continued

Taxa		Station Numbers					
		13	14	15	[illegible]	17	18
Division: Cyanophyta							
Chroococcaceae							
Merismopedia	I	0.71	-	-	-	-	-
	II	-	0.03	-	0.04	-	0.02
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	0.05	-
Oscillatoriaceae							
Arthrospira	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lyngbya	I	-	-	-	-	-	-
	II	-	-	-	0.04	-	-
	III	0.06	-	0.08	0.04	-	0.05
Oscillatoria	I	0.14	-	2.16	-	-	0.11
	II	0.10	0.13	-	0.08	0.04	0.04
	III	-	-	0.08	0.07	-	0.10
Nostoceaceae							
Anabaena	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Nodularia	I	-	-	-	-	-	-
	II	-	-	-	0.11	-	-
	III	-	-	-	-	-	-
Hammatoideaceae							
Rhaphidiopsis	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Stigonemataceae							
Stigonema	I	-	-	-	-	-	-
	II	0.05	-	-	-	-	-
	III	-	-	-	-	-	-
Dermocarpaceae							
Stichosiphon	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-7.--Continued

Taxa		Station Numbers					
		19	20	21	22	23	24
Division: Cyanophyta							
Chroococcaceae							
<u>Merismopedia</u>	I	-	-	15.56	-	3.31	-
	II	-	-	-	-	0.03	0.15
	III	0.09	-	-	-	-	-
Genus undetermined	I	-	-	-	-		0.20
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oscillatoriaceae							
<u>Arthrospira</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
<u>Lyngbya</u>	I	0.20	-	-	-	-	-
	II	0.46	-	0.16	0.65	-	0.95
	III	0.09	0.04	0.49	0.38	0.43	-
<u>Oscillatoria</u>	I	0.02	0.04	0.16	0.07	-	0.14
	II	5.16	0.06	0.49	0.50	1.08	0.29
	III	0.09	0.11	-	0.13	-	-
Nostoceaceae							
<u>Anabaena</u>	I	-	-	-	-	-	-
	II	0.09	-	-	-	-	-
	III	-	-	-	-	-	-
<u>Nodularia</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Hammatoideaceae							
<u>Rhaphidiopsis</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Stigonemataceae							
<u>Stigonema</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Dermocarpaceae							
<u>Stichosiphon</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-7.--Continued

Taxa		Station Numbers					
		25	26	27	28	29	30
Division: Cyanophyta							
Chroococcaceae							
<u>Merismopedia</u>	I	0.09	1.01	-	613.97	0.42	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	33.92	-	0.90	+
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oscillatoriaceae							
<u>Arthrospira</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	0.13	-	-
<u>Lyngbya</u>	I	-	-	-	-	-	-
	II	0.06	0.07	-	-	0.06	-
	III	-	0.38	0.34	0.88	0.24	0.37
<u>Oscillatoria</u>	I	-	0.34	-	-	0.13	+
	II	-	0.07	0.76	0.08	-	-
	III	0.24	-	-	-	-	-
Nostoceaceae							
<u>Anabaena</u>	I	-	-	-	-	-	-
	II	-	-	-	-	0.12	-
	III	-	-	-	-	-	-
<u>Nodularia</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Hammatoideaceae							
<u>Rhaphidiopsis</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Stigonemataceae							
<u>Stigonema</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	0.06	-	-	-	-
Dermocarpaceae							
<u>Stichosiphon</u>	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-7.--Continued

Taxa		Station Numbers 31	32	33	34	35	36
Division: Cyanophyta							
Chroococcaceae							
Merismopedia	I	-	0.64	0.06	-	-	-
	II	0.51	-	-	-	-	0.19
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	0.06	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oscillatoriaceae							
Arthrospira	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lyngbya	I	-	0.09	-	-	-	-
	II	0.20	0.15	-	2.84	0.09	0.38
	III	-	0.20	-	-	0.07	0.24
Oscillatoria	I	0.12	0.27	-	0.44	-	-
	II	-	0.08	0.68	-	0.19	-
	III	-	0.05	0.06	-	-	0.06
Nostoceaceae							
Anabaena	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	0.07	-	-	-	-	-
Nodularia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Hammatoideaceae							
Rhaphidiopsis	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Stigonemataceae							
Stigonema	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Dermocarpaceae							
Stichosiphon	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	0.15	-

Table B-7. Continued

Taxa		Station Numbers					
		37	38	39	[illegible]	[illegible]	4[illegible]
Division: Cyanophyta							
Chroococcaceae							
Merismopedia	I	+	-	-	-	0.18	0.14
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Genus undetermined	I	-	-	-	-	-	0.43
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Oscillatoriaceae							
Arthrospira	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Lyngbya	I	-	-	-	-	-	-
	II	-	0.20	-	0.12	-	0.08
	III	-	0.35	0.10	0.31	-	0.10
Oscillatoria	I	+	0.10	0.25	0.08	0.18	0.14
	II	-	-	0.07	-	-	-
	III	-	0.07	0.10	-	-	-
Nostoceaceae							
Anabaena	I	-	-	-	0.08	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	0.10
Nodularia	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Hammatoideaceae							
Rhaphidiopsis	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-
Stigonemataceae							
Stigonema	I	-	-	-	-	-	-
	II	-		-	-	-	-
	III	-	-	-	-	-	-
Dermocarpaceae							
Stichosiphon	I	-	-	-	-	-	-
	II	-	-	-	-	-	-
	III	-	-	-	-	-	-

Table B-7.--Continued

Taxa		43	44	45	46
Division: Cyanophyta					
Chroococcaceae					
Merismopedia	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Genus undetermined	I	-	-	0.20	-
	II	-	-	-	-
	III	-	-	-	-
Oscillatoriaceae					
Arthrospira	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Lyngbya	I	-	-	-	0.13
	II	0.11	0.33	0.28	0.06
	III	0.29	0.11	-	-
Oscillatoria	I	0.21	0.16	-	0.13
	II	-	0.07	0.03	-
	III	-	-	-	0.05
Nostocaceae					
Anabaena	I	-	-	-	-
	II	-	-	-	-
	III	0.07	-	0.04	-
Nodularia	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Hammatoideaceae					
Rhaphidiopsis	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-
Stigonemataceae					
Stigonema	I	-	-	-	-
	II	-	-	0.03	-
	III	-	-	-	-
Dermocarpaceae					
Stichosiphon	I	-	-	-	-
	II	-	-	-	-
	III	-	-	-	-

Table B-8.--Estimated number (organisms/liter) of minor phytoplankton taxa collected from the Alabama River with an 80-micron aperture Wisconsin plankton net.

Division: Chrysophyta	
Chrysophyceae	
Ochromonadaceae	
<u>Uroglenopsis</u>	II: 12(0.03); III: 32 (0.10), [illegible](0.19), [illegible](0.12), 38(0.07), 40(0.31), [illegible]4(0.04)
<u>Dinobryon</u>	III: 20(0.28)
Xanthophyceae	
Stipidococcaceae	
<u>Stipidococcus</u>	II: 1(0.02), 18(0.02); III: 1(0.05), 7(0.04), 36(0.2
Division: Pyrrophyta (Dinophyceae)	
Ceratiaceae	
<u>Ceratium</u>	III: 19(0.09), 22(0.06), 24(0.16), 26(0.06), 27(0.06), 28(0.25), 29(0.06)
Division: Euglenophyta	
Euglenaceae	
<u>Phacus</u>	I: 3(0.09), 24(0.58); II: 3(0.01), 23(0.61); III: 24(0.16)
<u>Trachelomonas</u>	I: 2(0.15), 13(0.14), 19(0.02), 28(1.41), 31(0.19), 32(0.50), 38(0.05), 40(0.08), 41(0.18); II: 3(0.01), 5(0.03), 7(0.06), 15(0.09), 19(0.09), 23(0.03), 27(132.30), 30 (0.05), 39(0.04); III: 1(0.05), 4(0.04), 22(0.06)
<u>Euglena</u>	I: 5(0.06); II: 23(1.93), 35(0.09), 36(0.19); III: 20(0.04), 28(0.13)

Explanation of II: 12(0.03)--II = run number, 12 = station number, 0.03 = estimated number of organisma/liter of water sampled.

I-August 9-25, 1977, samples

II-September 19-October 4, 1977, samples

III-October 31-November 17, 1977, samples

NOTE: Due to a computation error, plankton concentrations in this table were underestimated. To obtain the correct concentration, all values should be divided by .69[illegible].

Table B-9.--Estimated liters of water sampled with an 80-micron aperture Wisconsin plankton net at 46 Alabama River stations, August through December 1977.

Station number	I	II	III
1	30	154	50
2	38	154	77
3	43	154	70
4	61	77	46
5	51	154	127
6	51	154	97
7	51	154	135
8	51	154	127
9	51	154	62
10	51	154	154
11	51	154	127
12	51	154	154
13	68	154	154
14	77	124	135
15	75	77	77
16	201	97	154
17	79	154	154
18	154	154	154
19	118	154	154
20	35	154	154
21	105	154	154
22	131	154	154
23	58	154	154
24	127	77	77
25	97	154	154
26	143	116	116
27	154	154	154
28	154	58	58
29	154	154	154
30	178	154	154

I=August 9-25, 1977, samples
II=September 19-October 17, 1977, samples
III=October 31-November 17,1977, samples

Table B-9 --Continued

Station number	I	II	III
31	154	154	154
32	154	154	154
33	154	97	97
34	15	19	20
35	56	154	154
36	58	154	97
37	154	154	154
38	120	154	154
39	116	154	154
40	116	154	154
41	31	39	39
42	66	116	116
43	97	116	116
44	39	154	154
45	35	154	154
46	54	154	154

APPENDIX C

Benthic Macroinvertebrate Data

Table C-1.-- Insects (n/m^2) collected in Ponar samples from the Alabama River.

Taxa		Station Numbers 1 L	1 M	1 R	2 L	2 M	2 R	3 L	3 M	3 R	4 L	4 M	4 R	5 L	5 M	5 R	6 L	6 M	6 R
Order Ephemeroptera																			
Heptageniidae																			
Stenacron	I	19.1	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stenonema	I	-	-	-	-	-	-	-	57.3	-	-	-	-	-	-	-	-	-	-
	II	-	38.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ephemeridae																			
Hexagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	57.3	-	-	-	-	-	19.1	-	401.1	-	171.9	248.3	267.4	-	57.3	534.8	-	38.2
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae																			
Caenis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	1184.2	38.2	-	229.2	-	-	38.2	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Siphlonuridae																			
Siphlonurus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	38.2	95.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae																			
Tricorythodes	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Polymitarcidae																			
Tortopus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Heptageniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	19.1	-	-	-	19.1	-	-	-	-	19.1	-	-	-	-	-	-	-	-
Caenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	210.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Siphlonuridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	57.3	-	19.1	57.3	19.1	-	-	-	-	-	-	-	-	-	-	-	19.1	-
Order Odonata																			
Gomphidae																			
Gomphus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae																			
Basiaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coryphaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coenagrionidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gomphidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Neuroptera																			
Sisyridae																			
Climacia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sisyridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

L=left bank sample looking downstream
M=mid-stream sample
R=right bank sample looking downstream

I=August 9-25, 1977, samples
II=September 19-October 4, 1977, samples
III=October 31-November 17, 1977, samples
"-"=not encountered in collection

NOTE: Due to a computation error, benthic concentrations for August were underestimated. To obtain the correct concentration, multiply August values by 2.25.

Table C-1.--Continued

Taxa		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Order Ephemeroptera																			
Heptageniidae																			
Heptagenia	I	-	-	-	-	-	19.1	19.1	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stenonema	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ephemeridae																			
Hexagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	515.?	-	-	-	-	95.5	-	-	-	191.0	-	-	-	-	-	57.3	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae																			
Caenis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	19.1	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	19.1
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Siphlonuridae																			
Siphlonurus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae																			
Tricorythodes	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Polymitarcidae																			
Tortopus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Heptageniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	95.5	-	-
Siphlonuridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	19.1	-	-	-	19.1	19.1	76.4	19.1	76.4	-	19.1	-	-	-	-	-	19.1
Order Odonata																			
Gomphidae																			
Gomphus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae																			
Epiaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coryphaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coenagrionidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gomphidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Neuroptera																			
Sisyridae																			
Climacia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sisyridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers 13 L	13 M	13 R	14 L	14 M	14 R	15 L	15 M	15 R	16 L	16 M	16 R	L	M	R	L	M	R
Order Ephemeroptera																			
Heptageniidae																			
Heptagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stenonema	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ephemeridae																			
Hexagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	133.[illegible]	-	-	171.9	95.5	496.6	57.3	-	-	267.[illegible]	133.[illegible]	[illegible]	152.8	-	-	-	-	-
Pentagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae																			
Caenis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Siphlonuridae																			
Siphlonurus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae																			
Tricorythodes	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Polymitarcidae																			
Tortopus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Heptageniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	95.5	-	114.5	19.1	-	19.1	-	-	-	248.3	-	57.3	-	-	191.1	-	19.1	-
Siphlonuridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Odonata																			
Gomphidae																			
Gomphus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae																			
Epiaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	19.1	19.1	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coryphaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coenagrionidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-
Aeshnidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gomphidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Neuroptera																			
Sisyridae																			
Climacia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sisyridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers 19 L	19 M	19 R	20 L	20 M	20 R	21 L	21 M	21 R	22 L	22 M	22 R	23 L	23 M	23 R	24 L	24 M	24 R
Order Ephemeroptera																			
Heptageniidae																			
Heptagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stenonema	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	38.2	38.2	19.1	57.3	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ephemeridae																			
Hexagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	57.3	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae																			
Caenis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	19.1	-	57.3	57.3	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Siphlonuridae																			
Siphlonurus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae																			
Tricorythodes	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Polymitarcidae																			
Tortopus	I	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Heptageniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	57.3	-	-	-	-	57.3	19.1	-	-	-	-	-	-	-	-
Caenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Siphlonuridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Odonata																			
Gomphidae																			
Gomphus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae																			
Epiaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coryphaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coenagrionidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gomphidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Neuroptera																			
Sisyridae																			
Climacia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sisyridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers 25			26			27			28						30		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Order Ephemeroptera																			
Heptageniidae																			
Heptagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stenonema	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ephemeridae																			
Hexagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae																			
Caenis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	19.1	-	19.1	-	-	-	-	-	-	-	-	-	19.1	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Siphlonuridae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae																			
Tricorythodes	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Polymitarcidae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Heptageniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	76.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	152.0	-	19.1	-	-	-	-	-	-	19.1	-	-	-	-	-	19.1	-	-
Siphlonuridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Odonata																			
Gomphidae																			
Gomphus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae																			
Epiaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coryphaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coenagrionidae	I	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gomphidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	19.1	-	19.1	-	-	-	-	-	19.1	-	-	-	19.1	-	-	19.1	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Hemiptera																			
Gerridae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		31 L	31 M	31 R	32 L	32 M	32 R	33 L	33 M	33 R	34 L	34 M	34 R	35 L	35 M	35 R	36 L	36 M	36 R
Order Ephemeroptera																			
Heptageniidae																			
Heptagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stenonema	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ephemeridae																			
Hexagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae																			
Caenis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	76.4	-	-	-	133.7	-	-	-	-	-	-	-	-	38.2	-	-
Siphlonuridae																			
Siphlonurus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae																			
Tricorythodes	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Polymitarcidae																			
Tortopus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Heptageniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	19.1	19.1	-	-	57.3	-	76.4	-	-	19.1	-	-	-	-	-	-
Siphlonuridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Odonata																			
Gomphidae																			
Gomphus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae																			
Epiaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	57.3	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	19.1
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coryphaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coenagrionidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-
Gomphidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-
Order Neuroptera																			
Sisyridae																			
Climacia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sisyridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		37			38			39			40			41			42		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Order Ephemeroptera																			
Heptageniidae																			
Heptagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stenonema	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ephemeridae																			
Hexagenia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentagenia	I	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae																			
Caenis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	19.1	-	38.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Siphlonuridae																			
Siphlonurus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae																			
Tricorythodes	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Polymitarcidae																			
Ephoron	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Heptageniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
Caenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	19.1	-	-	-
Siphlonuridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Odonata																			
Gomphidae																			
Gomphus	I	19.1	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	19.1
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae																			
Epiaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coryphaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coenagrionidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	19.1	-	-	-	-	-	19.1	-	-	-	-	-
Gomphidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Neuroptera																			
Sisyridae																			
Climacia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sisyridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers											
		L	M	R	L	M	R	L	M	R	L		
Order Ephemeroptera													
Heptageniidae													
Heptagenia	I	-	-	-	-	-	-	-	-	-	-		
	II	-	-	-	-	-	-	-	-	-	-	-	
	III	-	-	-	-	-	-	-	-	-	-		
Stenonema	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-		
	III	-	-	-	-	-	-	-	-	-	-		-
Ephemeridae													
Hexagenia	I												
	II	-	-	-	-	-	-	-	-	-	-	-	
	III	-	-	-	-	-	-	-	-	-	-	-	
Pentagenia	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Caenidae													
Caenis	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Siphlonuridae													
Siphlonurus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	
	III	-	-	-	-	-	-	-	-	-	-	-	
Tricorythidae													
Tricorythodes	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Polymitarcidae													
Tortopus	I		-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-		
	III	-	-	-	-	-	-	-	-	-	-	-	
Heptageniidae	I	-	-	-	-	-	-	-	-	-	-		-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	38.2	-	-	-	-	-	-
Caenidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	19.1	-	19.1	-	-	-	-	-	-	-	-
Siphlonuridae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Tricorythidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III												
Order Odonata													
Gomphidae													
Gomphus	I	-	-	-	-	-	-	-	-	-	19.1	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae													
Epiaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Coryphaeschna	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Coenagrionidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Aeshnidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Gomphidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III												
Order Neuroptera													
Sisyridae													
Climacia	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Sisyridae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III												

Table C-1.--Continued

Taxa		Station Numbers																	
[illegible]	I	-	-	-	38.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	[illegible]	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tipulidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychodidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Blepharoceridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Culicidae Anopheles	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Dixidae [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Simuliidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ceratopogonidae Palpomyia	I	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	57.3	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chironomidae	I	-	-	76.4	-	-	-	57.3	57.3	19.1	-	-	19.1	57.3	-	19.1	-	[illegible]	[illegible]
	II	38.2	267.4	267.4	764.[illegible]	38.2	95.5	152.8	19.1	248.1	[illegible]	76.4	76.4	95.5	38.2	57.3	19.1	[illegible]	[illegible]
	III	38.2		611.2	2750.4	57.3	[illegible]	229.2	-	[illegible]	[illegible]	229.2	-	95.5	-	152.8	[illegible]	-	19.1
Culicidae Chaoborus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
	III	-	-	-			19.1	19.1	-	-	-			19.1	-	-	19.1	-	-
Ceratopogonidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	19.1	-	-	38.2	-	38.2	[illegible]	-	19.1	-	19.1		-	-

Table C-1.--Continued

Taxa		Station Numbers																	
		[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	[illegible]	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	19.1	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	38.2	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	19.1	-	-	19.1	-	-	-	-	-	38.2	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	19.1	-	19.1	-	[illegible]	19.1	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	19.[illegible]
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tipulidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychodidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Blepharoceridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Culicidae Anopheles	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Dixidae [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Simuliidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ceratopogonidae Palpomyia	I	-	-	-	-	-	19.1	-	-	19.1	-	-	-	-	-	-	19.1	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sciaridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-
Chironomidae	I	-	-	-	57.1	-	-	19.1	19.1	95.5	28[illegible]	-	38.2	-	-	19.[illegible]	[illegible]	-	-
	II	9[illegible].8	133.2	38.2	19.1	19.1	163.8	-	57.3	-	9[illegible].5	19[illegible]	19.1	-	-	[illegible].8	[illegible]	[illegible]	[illegible]
	III	32[illegible]	152.8	95.5	57.3	-	974.1	152.8	133.7	152.8	191.[illegible]	[illegible]	4[illegible]	[illegible]	19.[illegible]	-	[illegible]	[illegible]	[illegible]
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	19.1	-	1[illegible]	-	-	-	38.2	-	[illegible]
	III	-	19.1	-	-	-	-	-	-	-	-	57.1	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers																	
		13			14			15			16			17			18		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Order Diptera																			
Chironomidae																			
[illegible]chironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pseudochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cryptochironomus	I	-	-	-		19.1	-	-	-	-	-	57.3	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stenochironomus	I	-	-	-	19.1	19.1	-	-	-	-	-	-	19.1	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]chironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stictochironomus	I	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	19.1	38.2	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentaneura	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Procladius	I	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ablabesmyia	I	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coelotanypus	I	-	-	-	19.1	38.2	-	-	-	-	-	-	19.1	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	38.2	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tanytarsus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tipulidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychodidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Blephariceridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Culicidae																			
Anopheles	I		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Dixidae																			
Paradixa	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Simuliidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ceratopogonidae																			
Palpomyia	I	-	-	-	19.1	-	-	-	38.2	-	19.1	-	38.2		-	-	-	-	-
	II	76.4	-	-	38.2	-	19.1	-	-	-	95.5	-	-	19.1	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chironomidae	I	-	-	-	-	-	-	-	-	-	38.2	-	-	-	-	95.5	-	-	-
	II	133.7	57.3	38.2	114.5	19.1	-	229.2	114.5	248.3	95.5	19.1	171.9	38.2	19.1	229.2	76.4	114.5	-
	III	152.8	-	-	229.2	57.3	439.3	420.2	229.2	57.3	133.7	-	152.8	19.1	-	401.1	19.1	19.1	57.3
Culicidae																			
Chaoborus	I	-	-	-	-	-	-	-	-	-	-		54.3	-	19.1	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-		19.1	-	-	-	-	-
	III	-	-	-	-	95.5	-	-	57.3	-	-	-	19.1	19.1	-	-	-	-	-
Ceratopogonidae	I	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-		-	-	-
	II	-	-	-	-	19.1	-	-	-	-	-	-	57.3	-	-	-	-	-	
	III	38.2	-	-	19.1	38.2	19.1	-	-	-	-	-	19.1	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers 19			20			21			22			[illegible]			[illegible]		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Order Diptera																			
Chironomidae																			
Xenochironomus	I	-	-	-	-	-	-	-	-	57.3	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psuedochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cryptochironomus	I	-	-	-	-	-	-	-	-	-	-	57.3	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stenochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Goeldichironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stictochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Glyptotendipes	I	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentaneura	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Procladius	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ablabesmyia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Coelotanypus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Polypedilum	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tanytarsus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tipulidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychodidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Blephariceridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Culicidae																			
Anopheles	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Dixidae																			
Paradixa	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Simuliidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ceratopogonidae																			
Palpomyia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	58.2	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sciaridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chironomidae	I	-	-	133.7	-	477.5	171.9	19.1	-	611.2	19.1	-	19.1	57.3	15.1	-	-	-	19.1
	II	-	-	-	38.2	439.3	19.1	38.2	57.3	19.1	38.2	133.7	-	76.4	38.2	-	38.2	210.1	-
	III	-	-	38.2	38.2	95.5	114.6	114.6	-	-	-	-	-	19.1	19.1	95.5	19.1	-	19.1
Culicidae																			
Chaoborus	I	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	38.2	-	-	-	-	-	-	-	-	-	-		19.1	-
	III	-	-	-	-	-	19.1	-	-	-	-	-	19.1	-	-	19.1	-	-	-
Ceratopogonidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		31 L	31 M	31 R	32 L	32 M	32 R	33 L	33 M	33 R	34 L	34 M	34 R	35 L	35 M	35 R	36 L	36 M	36 R
[illegible]																			
[illegible]																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]edochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-
[illegible]idae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	38.2	-	19.1	38.2	-	-	-	-	19.1	-	-	-	19.1	-	19.1	-	76.4
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	38.2
	II	-	-	267.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-	76.4
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	191.0	38.2	229.2	-	114.6	267.4	-	-	38.2	[illegible]	76.4	57.3	-	[illegible]	38.2	[illegible]	-	19.1
	II	-	114.6	76.4	95.5	324.7	191.0	382.0	95.5	210.1	[illegible]	[illegible]	114.6	[illegible]	95.5	38.2	[illegible]		286.5
	III	382.0	[illegible]	[illegible]	152.8	496.6	95.5	229.2	57.3	1890.9	229.2	[illegible]	[illegible]	[illegible]	19.1	[illegible]		38.2	[illegible]
[illegible]idae	I	-	19.1	57.3	76.4	-	38.2	-	-	19.1	-							-	-
[illegible]	II	-	38.2	-	19.1	38.2	-	-	-	-	19.1	-			19.1		19.1		76.4
	III	38.2	57.3	95.5	-	114.6	-	-	-	-	-	-	-		-			-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-								
	II	-	-	-	-	-	-	-	-	-	-								
	III	38.2		191.0		38.2	-	-	-	-	-		-						[illegible]

Table C-1.--Continued

Taxa		Station Numbers 37 L	37 M	37 R	38 L	38 M	38 R	39 L	39 M	39 R	40 L	40 M	40 R	41 L	41 M	41 R	42 L	42 M	42 R
Order Diptera																			
Chironomidae																			
Xenochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pseudochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cryptochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stenochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Goeldichironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stictochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Glyptotendipes	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pentaneura	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Procladius	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ablabesmyia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tipulidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychodidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Blephariceridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Culicidae																			
Anopheles	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Dixidae																			
Paradixa	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Simuliidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ceratopogonidae																			
Palpomyia	I	76.4	19.1	38.2	76.4	-	-	38.2	38.2	19.1	-	19.1	38.2	38.2	-		-	-	210.1
	II	133.7	19.1	-	19.1	-	57.3	-	-	-	-	-	152.8	19.1	-		19.1	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sciaridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-			-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-			-	-	-
Chironomidae	I	[illegible]	-	38.2	76.4	38.2	-	76.4	19.1	38.2	19.1	114.6	362.9	248.3	191.0	[illegible]		-	[illegible]
	II	[illegible]	-	19.1	19.1	-	76.4	19.1	19.1	38.2	19.1	95.5	76.4	229.2	57.3	[illegible]	[illegible]	114.6	[illegible]
	III	706.7	-	191.0	171.9	19.1	267.4	248.3	-	171.9	133.7	-	267.4	76.4	[illegible]	[illegible]	57.3	-	[illegible]
Culicidae																			
Chaoborus	I	38.2	-	-	57.3	19.1	-	57.3	-	38.2	-	-	19.1	38.2	114.6	76.4	-	-	-
	II	-	19.1	-	-	76.4	-	-	-	57.3	38.2	57.3	19.1	-	-	-	-	95.5	-
	III	57.3	-	-	-	-	-	-	-	-	-	-	-	-	248.3	-	-	-	-
Ceratopogonidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	706.7	-	420.2	171.9	-	152.8	76.4	-	76.4	152.8	-	286.5	19.1	19.1	-	-	-	76.4

Table C-1.--Continued

Taxa		43 L	43 M	43 R	44 L	44 M	44 R	45 L	45 M	45 R	46 L	46 M	46 R
Order Diptera													
Chironomidae													
Xenochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Pseudochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Cryptochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Stenochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Goeldichironomus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Stictochironomus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Glyptotendipes	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Pentaneura	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Procladius	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Ablabesmyia	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Coelotanypus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Polypedilum	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Tanytarsini	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Tipulidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Psychodidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	19.1	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Blephariceridae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Culicidae													
Anopheles	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Dixidae													
Paradixa	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Simuliidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Ceratopogonidae													
Palpomyia	I	-	19.1	76.4	-	-	-	38.2	-	-	57.3	133.7	-
	II	439.3	19.1	-	-	19.1	-	-	19.1	-	-	19.1	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Sciaridae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Chironomidae	I	-	19.1	229.2	-	38.2	38.2	133.7	-	-	19.1	-	38.2
	II	191.0	38.2	152.8	-	114.6	-	-	38.2	19.1	-	-	-
	III	286.5	19.1	210.1	-	57.3	57.3	-	-	-	-	19.1	19.1
Culicidae													
Chaoborus	I	-	38.2	-	-	-	-	76.4	-	-	57.3	-	19.1
	II	19.1	19.1	19.1	-	-	-	19.1	-	-	-	-	19.1
	III	-	-	-	-	-	-	-	-	-	-	-	-
Ceratopogonidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	76.4	-	38.2	-	-	133.7	19.1	-	-	-	38.2	57.3

Table C-1.--Continued

Taxa		Station Numbers 1 L	1 M	1 R	2 L	2 M	2 R	3 L	3 M	3 R	4 L	4 M	4 R	5 L	5 M	5 R	6 L	6 M	6 R
Order [illegible] [illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible] [illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Isotomidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible] [illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible] [illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible] [illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers 7			8			9			10						12		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
der Coleoptera																			
Ptilodactylidae																			
Anchycteis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Anchytarsus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Dytiscidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Haliplidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chrysomelidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydraenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psephenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
der Collembola																			
Isotomidae																			
Isotomurus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
rder Hemiptera																			
Mesoveliidae																			
Mesovelia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Corixidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
rder Homoptera																			
Delphacidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
rder Hymenoptera																			
Braconidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
rder Thysanoptera																			
Phlaeothripidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
rder Orthoptera																			
Tridactylidae																			
Tridactylus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
rder Trichoptera																			
Hydropsychidae																			
Hydropsyche	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa

Station Numbers

Table C-1.--Continued

Taxa		19 L	19 M	19 R	20 L	20 M	20 R	21 L	21 M	21 R	22 L	22 M	22 R	23 L	23 M	23 R	24 L	24 M	24 R
Order Coleoptera																			
Ptilodactylidae																			
Anchycteis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Curculionidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Dytiscidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	19.1	-	-	-	-	-	38.2	-	-	-	-	-	-	-	-	-	-
Haliplidae	I	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chrysomelidae	I	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydraenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psephenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Collembola																			
Isotomidae																			
Isotomurus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Isotomidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Hemiptera																			
Mesoveliidae																			
Mesovelia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	38.2	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Corixidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Homoptera																			
Delphacidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	38.2	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Hymenoptera																			
Formicidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Thysanoptera																			
Phlaeothripidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Orthoptera																			
Tridactylidae																			
Tridactylus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Trichoptera																			
Hydropsychidae																			
Hydropsyche	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		25 L	25 M	25 R	26 L	26 M	26 R	27 L	27 M	27 R	28 L	28 M	28 R	29 L	29 M	29 R	30 L	30 M	30 R
Order Coleoptera																			
Ptilodactylidae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	38.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cupe[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
D[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hal[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ch[illegible]melidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
H[illegible]enidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible]																			
[illegible]idae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible]era																			
[illegible]																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible]era																			
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	38.2	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible]era																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible]era																			
Ph[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	57.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible]ptera																			
[illegible]																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible]optera																			
Hydr[illegible]idae																			
[illegible]psyche	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers 31			32			33			34			35			36		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Order Coleoptera																			
Ptilodactylidae																			
Anchytarsus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Achytarsus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1
Eupendidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Dytiscidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Haliplidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chrysomelidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydraenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psephenidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Collembola																			
Isotomidae																			
Isotomurus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]ntomidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Hemiptera																			
Mesoveliidae																			
Mesovelia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Corixidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Homoptera																			
Delphacidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Hymenoptera																			
Braconidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Thysanoptera																			
Phlaeothripidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Orthoptera																			
Tridactylidae																			
Tridactylus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Trichoptera																			
Hydropsychidae																			
Hydropsyche	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers																	
			37			38			39			40			41			42	
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Order Coleoptera Ptilodactylidae Anchy[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	18.[illegible]	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Anchytarsus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Haliplidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Chrysomelidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Collembola [illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Isotomidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible]ptera [illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Hemiptera Delphacidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Hymenoptera Braconidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Thysanoptera Phlaeothripidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order [illegible]ptera [illegible]idae [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Trichoptera Hydropsychidae Hydropsyche	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers											
		43			44			45			46		
		L	M	R	L	M	R	L	M	R	L	M	R
Order Coleoptera													
Ptilodactylidae													
Anchycteis	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Anchytarsus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Cupedidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Dytiscidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Haliplidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Chrysomelidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Hydraenidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Pselaphidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Order Collembola													
Isotomidae													
Isotomurus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Isotomidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Order Hemiptera													
Mesoveliidae													
Mesovelia	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Corixidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Order Homoptera													
Delphacidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Order Hymenoptera													
Braconidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Order Thysanoptera													
Phlaeothripidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Order Orthoptera													
Tridactylidae													
Tridactylus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Order Trichoptera													
Hydropsychidae													
Hydropsyche	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	19.1	-	76.4	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers 1 L	1 M	1 R	2 L	2 M	2 R	3 L	3 M	3 R	4 L	4 M	4 R	5 L	5 M	5 R	6 L	6 M	6 R
Hydroptilidae																			
Mayatrichia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ochrotrichia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Orthotrichia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Oxyethira	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Stactobiella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Polycentropodidae																			
Polycentropus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Philopotamidae																			
Chimarra	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Rhyacophilidae																			
Rhyacophila	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Leptoceridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-
Lepidostomatidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Limnephilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychomyiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Rhyacophylidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Philopotamidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydroptilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	601.1	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
Hydropsychidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-
Tricoptera (Unidentified)	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa | **Station Numbers**

Taxa		7 L	7 M	7 R	8 L	8 M	8 R	9 L	9 M	9 R	10 L	10 M	10 R	11 L	11 M	11 R	12 L	12 M	12 R
Hydroptilidae [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ochrotrichia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Oxyethira	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Philopotamidae [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Leptoceridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lepidostomatidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	19.1	-	57.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Limnephilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychomyiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Rhyacophilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Philopotamidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydroptilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	38.2	19.1	-	-	-	-	-	38.2	19.1	-	-	-	19.1	-	19.1	-	-	-
Hydropsychidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichoptera (Unidentified)	I	-	-	-	-	-	-	-	-	-	-	-	-	-	57.3	-	19.1	-	-
	II	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		13 L	13 M	13 R	14 L	14 M	14 R	15 L	15 M	15 R	16 L	16 M	16 R	17 L	17 M	17 R	18 L	18 M	18 R
Hydropsychidae [illegible]	I	-	-	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]ella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phil[illegible] [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ph[illegible]idae [illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Leptoc[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lepidostomatidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Limnephilidae	I	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychomyiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Rhyacophylidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Philopotamidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydroptilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	19.1	-	19.1	-	-	-	-	19.1	19.1	-	-	-	-	19.1	-	-	-	-
Hydropsychidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichoptera (Unidentified)	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		19 L	19 M	19 R	20 L	20 M	20 R	21 L	21 M	21 R	22 L	22 M	22 R	23 L	23 M	23 R	24 L	24 M	24 R
Station Numbers																			
[illegible]																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Leptoceridae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lepidostomatidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Limnephilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychomyiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Rhyacophylidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Philopotamidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydroptilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydropsychidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricoptera (Unidentified)	I		-	-	-	19.1	-	19.1	-	19.1	19.1	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers																	
		[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	27	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	[illegible]	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	[illegible]	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Limnephilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychomyiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-
Rhyacophilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Philopotamidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydroptilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	57.1	19.1	-
Hydropsychidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Trichoptera	I						-	-	-	-	-	76.4	19.1			-	[illegible]		19.1
(Unidentified)	II	-		19.1	-			-	-	-	-	-		19.1	-	-	-		-
	III						-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		31			32			33			34			35			36		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Hydroptilidae																			
Mayatrichia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ochrotrichia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Polycentropodidae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lepidostomatidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Limnephilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychomyiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	133.7	-	-	-	-	-	-	-	-	-
Rhyacophylidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Philopotamidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydroptilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	19.1	38.2	57.3	-	-	-	-	-	19.1	-	38.2	-	-	-	-	-	-	-
Hydropsychidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricoptera (Unidentified)	I	19.1	-	-	-	-	-	-	-	-	19.1	-	-	-	95.5	38.2	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		Station Numbers 17			18			19			20			21			22		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	19.1	-	-	19.1	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Limnephilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Psychomyiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Rhyacophilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Philopotamidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hydroptilidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
Hydropsychidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tricoptera (Unidentified)	I			-		-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II				-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III				-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-1.--Continued

Taxa		43 L	43 M	43 R	44 L	44 M	44 R	45 L	45 M	45 R	46 L	46 M	46 R
Hydroptilidae													
Mayatrichia	I	-		-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-
	II		-	-	-	-	-	-	-	-	-	-	-
	III		-	-	-	-	-	-	-	-	-	-	-
[illegible]idae													
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-
	II		-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]													
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-
	II				-	-	-	-	-	-	-	-	-
	III				-	-	-	-	-	-	-	-	-
[illegible]													
[illegible]	I	-	-		-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-		-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]idae	I	-		-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Limnephilidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Psychomyiidae	I		-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Rhyacophilidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Philopotamidae	I		-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III		-	-	-	-	-	-	-	-	-	-	-
Hydroptilidae	I		-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	19.1	-
Hydropsychidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Tricoptera (Unidentified)	I	-	-	-	-	-	-	-	19.1	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-

Table C-2.-- Annelids (n/m^2) collected in Ponar samples from the Alabama River.

Taxa		Station Numbers 1			2			3			4			5			6		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Class Oligochaeta																			
Aeolosomatidae																			
Aeolosoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	19.1	-	19.1	19.1	57.3	-	-	19.1	171.9	57.3	-	-	38.2	-
	III	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Haplotaxidae																			
Haplotaxis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	38.2	-	-	-	-	114.5	210.1	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lumbriculidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	57.3	-	-	-	-	-	-	-	-	-	133.7	-	133.7
Lumbriculus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-
	III	-	-	95.5	-	-	-	-	-	-	57.3	57.3	-	-	-	-	-	-	-
Kincaidiana	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	57.3	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1
Eclipidrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	306.7	-	-	-	-	-	-	-	-	-	-	-	-	-
Naididae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	19.1	19.1	477.5	19.1	-	57.3	286.5	95.5	57.3	439.3	38.2	-	114.6	630.2	133.7
	III	-	19.1	76.4	-	-	133.7	-	38.2	-	-	-	-	-	-	-	-	-	-
Tubificidae																			
Aulodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	114.5	38.2	19.1	-	-	133.7	-	286.5	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bothrioneurum	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	19.1	-	19.1	267.4	-	19.1	38.2	-	-	19.1	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Branchiura	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	57.3	-	-	687.6	-	-	-	57.3	-	-	-	-	-
	III	-	-	19.1	-	-	-	-	-	-	343.8	95.5	191.0	19.1	-	-	-	114.6	334.8
Limnodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	57.3	-	-	-	19.1	-	-	-	-	-	-	-	-	19.1	-	19.1
Peloscolex	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	57.3	-	-	-	-	-	-	-	-	171.9	19.1	-	-	76.4	19.1	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubifex	I	-	-	-	-	-	-	-	57.3	439.3	267.4	267.4	439.3	477.5	611.2	687.6	95.5	840.4	420.2
	II	-	-	19.1	152.8	38.2	152.8	-	38.2	-	-	248.3	191.0	2026.0	-	305.6	-	286.5	133.7
	III	-	-	19.1	38.2	-	267.4	133.7	-	-	458.6	210.1	76.4	95.5	76.4	95.5	57.3	-	57.3
Lumbriculidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubificidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	38.2	-	-	-	76.4	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	76.4	-	-	38.2	76.4
Class Hirudinea	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Glossiphoniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hirudidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Erpobdellidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

L=left bank sample looking downstream
M=mid-stream sample
R=right bank sample looking downstream

I=August 9-25, 1977, samples
II=September 19-October 4, 1977, samples
III=October 31-November 17, 1977, samples
"-"=not encountered in collection

NOTE: Due to a computation error, benthic concentrations for August were underestimated. To obtain the correct concentration, multiply August values by 2.25.

Table C-2.--Continued

Taxa		Station Numbers 7			8			9			10			11			12		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Class Oligochaeta																			
Aeolosomatidae																			
Aeolosoma	I	-	-	-	-	-	19.1	-	95.5	-	19.1	-	-	19.1	19.1	19.1	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Haplotaxidae																			
Haplotaxis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lumbriculidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	515.7	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	19.1	95.5	-	-	-	-	-	19.1	-	-	-	-	-
Lumbriculus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	38.2	-	-	-	19.1	-
	III	-	-	-	-	19.1	-	-	-	19.1	-	-	-	-	-	-	-	-	-
Kincaidiana	I	-	-	-	-	-	-	-	-	-	-			-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-			-	-	-	-	-	-
	III	-	-	-	-	-	19.1	-	-	-	-			-	-	-	-	-	-
Eclipidrilus	I	-	-	-	-	-	-	-	-	-	-			-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-			-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-			-	-	-	-	-	-
Naididae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	114.6	19.1	-	-	-
	II	19.1	-	38.2	210.1	19.1	-	-	19.1	-	-	-	-	-	-	-	19.1	-	-
	III	-	-	-	38.2	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubificidae																			
Aulodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bothrioneurum	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	38.2	286.5	-	19.1	-	-	343.8	-	-	-	-	-	-	-	57.3	19.1	-	19.1
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	324.7	
Branchiura	I	-	-	-	-	-	19.1	2081.9	57.3	-	-	-	-	-	19.1	19.1			-
	II	133.7	915.9	95.5	534.8	343.8	133.7	2081.9	57.3	-	76.4	229.2	-	-	57.3		95.5	-	401.1
	III	744.9	267.4	-	-	-	343.8	-	-	76.4	477.5	95.5	-	-	152.8	-	-	-	916.8
Limnodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	
	III	19.1	-	-	114.5	38.2	-	-	-	-	-	-	-	-	-		76.4		-
Peloscolex	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1
Tubifex	I	1508.9	1146.0	859.5	1012.3	324.7	-	114.6	19.1	248.3	-	-	725.8	133.7	878.6	324.7	1413.4	-	592.1
	II	668.5	95.5	-	725.8	897.7	1680.8	152.8	-	191.0	114.6	687.6	19.1	-	57.3	-	401.1	1738.1	229.2
	III	133.7	248.3	-	133.7	38.2	152.8	57.3	-	-	114.6	114.6	343.8	-	-	57.3	38.2	38.2	133.7
Lumbriculidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubificidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	343.8	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	382.0	-	-	57.3	-	477.5	573.0	-	152.8	171.9	114.6	1050.5	-	19.1	-	-	-	477.5
Class Hirudinea	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Glossiphoniidae	I	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	19.1	-	-	19.1	-	-	19.1	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hirudidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Erpobdellidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-

Table C-2.--Continued

Taxa		13 L	13 M	13 R	14 L	14 M	14 R	15 L	15 M	15 R	16 L	16 M	16 R	17 L	17 M	17 R	18 L	18 M	18 R
Class Oligochaeta																			
Aeolosomatidae																			
Aeolosoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Haplotaxidae																			
Haplotaxis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	19.1	95.5	[illegible]	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lumbriculidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	267.4	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	38.2	-	-	19.1	[illegible]	-	[illegible]	[illegible]	38.2	-	19.1	[illegible]	-	-	-
Lumbriculus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	[illegible]	[illegible]	-	[illegible]	38.2	-	76.9	[illegible]	[illegible]	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	[illegible]	-	-	-
Naididae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	9.1	-	38.2	-	-	-	-	57.3	38.2	95.5	[illegible]	[illegible]	-	-	-	-	19.1	-
	III	-	-	-	-	-	-	-	-	-	[illegible]	-	-	-	-	19.1	-	-	-
Tubificidae																			
Aulodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	[illegible]	-	171.9	-	-	152.8	267.4	57.3	-	95.5	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	210.1	19.1	-	-
Branchiura	I	-	-	-	-	-	-	-	-	-	-	-	19.1	[illegible]	-	[illegible]	-	-	-
	II	[illegible]	-	19.1	-	-	573.0	[illegible]	133.7	-	668.5	95.5	[illegible]	[illegible]	[illegible]	[illegible]	-	343.8	-
	III	95.5	-	-	630.3	-	-	-	95.5	-	-	-	496.5	-	210.1	133.7	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	76.4	[illegible]	-	-	-	-	-
Peloscolex	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	210.1	-	-	-	-	-	171.9	76.4	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubifex	I	-	-	18.2	611.2	229.2	18.2	286.5	-	248.3	[illegible]	210.1	362.9	57.3	95.5	[illegible]	[illegible]	19.1	19.1
	II	95.5	-	534.8	-	95.5	210.1	57.3	191.0	-	152.8	-	-	[illegible]	1012.9	[illegible]	-	-	19.1
	III	267.4	-	-	19.1	-	191.0	-	305.6	-	-	-	19.1	19.1	19.1	152.8	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubificidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	859.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	[illegible]	-	38.2	267.4	133.7	439.3	191.0	229.2	-	38.2	-	114.6	19.1	57.3	76.4	-	-	-
Class Hirudinea	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Glossiphoniidae	I	-	-	-	-	-	-	38.2	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hirudidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Erpobdellidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-

Table C-2.--Continued

Taxa		19 L	19 M	19 R	20 L	20 M	20 R	21 L	21 M	21 R	22 L	22 M	22 R	23 L	23 M	23 R	24 L	24 M	24 R
Class Oligochaeta																			
Aeolosomatidae																			
Aeolosoma	I	-	-	-	-	-	19.1	-	-	-	-	-	19.1	-	-	-	-	-	-
	II		-	-		-	-	-	-	-	-	19.1	-	-	-	[illegible]	-	-	-
	III		-	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-
Haplotaxidae																			
Haplotaxis	I	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-	-
	II		-	-	-	-	-	-	-	-	-	-	-	19.1		-	-	-	-
	III		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		
Lumbriculidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-		-	-	-	-	-	-	-	-	-	-	-
Lumbriculus	I	-	-		-	-	-	-	-	-	-	-	-	-		-	-	-	-
	II	-	-	-	-	-	-	210.1	-	-	-	210.1	-	114.6	-	57.3	-	-	-
	III	-	-	-	-	95.5	19.1	-	-	-	-	-	-	-		-	-	-	-
Kincaidiana	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-
	III			-	-	19.1	-	-	-	-	-	-		-	-	-	-	-	-
Eclipidrilus	I	-	-	-	-	-	-		-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-		-	-	-	-	-	-	-	-		-	-	-	-	-	-
Naididae	I	-	-	-	38.2	-	19.1	-	-	-	38.2	19.1	19.1	-	-	-	19.1	-	-
	II	-	-	-	19.1	-	-	-	38.2	-	-	[illegible]	-	38.2	-	38.2	-	-	-
	III	-	-	-	-	-	-	-	57.3	-	-	-	-	-	-	-	-	-	-
Tubificidae																			
Aulodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bothrioneurum	I	-	-		-	-	-	-	-	-	-	-	-	19.1	-	19.1	-	[illegible]	-
	II	-	-	-	-	-	-		-	-	-	-	-	-	-	19.1	-	-	-
	III	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-
Branchiura	I	-	-	-	-	-	-	-	-	-	-	-	133.7	-	-	-	-	-	-
	II	-	-	-	-	-	-	19.1	-	-	-	-	-	133.7	-	57.3	-	229.2	-
	III	-		-	-	-	-	-	-	-	-	-	-	-	-	401.1	-		-
Limnodrilus	I		-	-	-	-		-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-		-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-		19.1	57.3	19.1	-	-	-	-	-	-	-	133.7	-	-	19.1
Peloscolex	I	-	-	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	76.4	-	-	38.2	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-	-
Tubifex	I	-	-	152.8	-		286.5	-	57.3	-	-	267.4	592.1	1011.4	38.2	-	840.4	-	-
	II	-	-	19.1	-		-	-	-	-	-	-	-	114.5	-	76.4	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-		19.1	-	19.1	95.5
Lumbriculidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-		-	-	-	-	-	-
Tubificidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	114.6	38.2	-	-
Class Hirudinea	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Glossiphoniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hirudidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Erpobdellidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-2.--Continued

Taxa		Station Numbers [illegible] L	M	R	26 L	M	R	27 L	M	R	[illegible] L	M	R	[illegible] L	M	R	[illegible] L	M	R
Class Oligochaeta																			
Aeolosomatidae																			
Aeolosoma	I	-	-	-	-	-	-	-	-	-	-	-	-	[illegible]	-		19.1	-	-
	II	-	95.5	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-
	III	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-		-	-	-
Haplotaxidae																			
Haplotaxis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	76.4	-	-	-	76.4	-	114.6	-	-	-	-	-	19.1	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lumbriculidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	191.0	-	
	III	19.1	-	-	-	-	-	-	-	76.4	-	-	-	152.9	-	-	-	-	-
Lumbriculus	I	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	[illegible]	[illegible]	114.6	-	-	[illegible]	-	19.1	-	-	-		-	76.4	[illegible]	38.2		[illegible]
	III	-		-	57.3	-	-	-	-	-	-	-	-	-	-	-	-	-	[illegible]
Kincaidiana	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Eclipidrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-		-	-	-	-	-	-	-		-	-	-	-	-	-	-
	III	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Naididae	I	19.1	-	-	-	57.3	-	95.5	-	-	76.4	76.4	19.1	57.3	[illegible]	[illegible]	38.2	-	[illegible]
	II	-	[illegible]	-	-	-	-	-	-	-	-	-		-	[illegible]		38.2	-	-
	III	-	19.1	-	-	57.3	-	-	-	57.3	-	-	-	-	-	-	-	-	-
Tubificidae																			
Aulodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-		-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bothrioneurum	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	133.7		-	19.1	-	19.1	-	-	-	19.1	[illegible]	-	-	-	-	[illegible]
	III	-	-	-	-	-	-	-	-	57.3	-	-	-	19.1	-	-	-	-	-
Branchiura	I	-	-	-	-	-	-	-	-	-	-	114.6	19.1	-	-		-	-	[illegible]
	II	-	19.1	668.5	439.3	-	1126.9	-	[illegible]	-	515.7	38.2	[illegible]	[illegible]	-	-	[illegible]	-	[illegible]
	III	152.8	-		859.[illegible]	-		-	-	362.9	362.9	-	57.3	-		-	[illegible]	-	-
Limnodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	19.1	-	-	57.3	-	[illegible]	-	-	171.9	-	-	-	-	-	-	-	-	-
Peloscolex	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	76.4	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	76.4	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubifex	I	974.[illegible]	191.0	114.6	-	-	859.5	-	286.5	57.3	191.0	114.6	171.9	114.6	[illegible]		[illegible]	[illegible]	[illegible]
	II	-	38.2	38.2	-	-	95.5	-	267.4	-	191.0	-	-	95.5	[illegible]	[illegible]	[illegible]	[illegible]	-
	III	-	19.1	-	57.3	-	38.2	-	-	267.4	-	-		95.5	19.1	38.2			-
Lumbriculidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubificidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	[illegible]	-	-
	III	-	-	229.2	95.5	-	-	-	-	-	420.2	-	-		-	-	114.6	-	-
Class Hirudinea	I		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Glossiphoniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hirudidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Erpobdellidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-2.--Continued

Taxa		Station Numbers 31 L	31 M	31 R	32 L	32 M	32 R	33 L	33 M	33 R	34 L	34 M	34 R	[illegible] L	[illegible] M	[illegible] R	[illegible] L	[illegible] M	[illegible] R
Class Oligochaeta																			
Aeolosomatidae																			
Aeolosoma	I																		
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Haplotaxidae																			
Haplotaxis	I	-	-		-	-	-	-	-	-	-	-	-	-	-		-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III		-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lumbriculidae																			
Species A	I	-	-		-	-		-		-	-	-	-	-		-	-	-	-
	II	-	-	-	-	-	-	611.2		-	725.8	-	-	-	-	38.2	-	-	-
	III	-	-	-	-	-	-	-		-	-	-	-	-	-	-	-	-	-
Lumbriculus	I	-	-		-	-		-	-		-	-	-	-	-	-	-	-	-
	II	19.1		-	38.2	-	38.2	477.5	-	-	55.5	-	-	19.1	-	-	-	57.3	76.4
	III	-			38.2	-	-	248.1	-	114.6	133.7	19.1	-	-	-	-	-	-	-
Kincaidiana	I		-	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-
	III	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Eclipidrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Naididae	I	57.3		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-		19.1	-	-	-	-	248.3	-
	III	-	-	-	-	-	-	-	-	19.1	-		-	-	-	-	-	-	-
Tubificidae																			
Aulodrilus	I	-	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bothrioneurum	I	-	-		-	-	-	-	-	-	-		-	-	-	-	-	-	-
	II	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	19.1	-	-			-	-	-	-	-	-	-
Branchiura	I	38.2	-	-	-	-	19.1	-	-	-	38.2	19.1	-	-	-	19.1	-	76.4	133.7
	II	267.4	-	-	267.4	-	592.1	229.2	-	-	191.0		248.3	-	-	76.4	38.2	-	114.5
	III	267.4	-	229.2	-	-	191.0	802.2	-	133.7	-	76.6	-	-	-	-	-	-	-
Limnodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	439.3	-
	III	-	-	-	95.5	-	-	133.7	-	76.4	229.2	-	-	-	-	-	-	-	-
Peloscolex	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	114.6	-	-	-	-	-	-	-	-	-	-	-
Tubifex	I	1012.3	744.9	-	19.1	668.5	19.1	1165.1	38.2	19.1	725.8	114.5	439.3	57.3	76.4	-	-	38.7	401.1
	II	286.5	114.6	133.7	-	-	19.1	-	-	649.4	38.6	649.4	668.5	-	-	-	57.3	38 .	38.2
	III	76.4	-	171.9	19.1	19.1	171.9	38.2	-	76.4	-	95.5	-	-	-	-	-	19.1	-
Lumbriculidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubificidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	630.3	38.2	-	706.7	-	-	-	-	19.1	-	248.3	-
	III	-	-	-	-	-	-	-	-	-	-	-	133.7	-	-	-	-	-	-
Class Hirudinea	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Glossiphoniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hirudidae	I	-	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Erpobdellidae	I							-	-	-	-	-	-	-	-	-	-	-	-
	II							-	-	-	-	-	-	-	-	-	-	-	19.1
	III							-	-	-	-	-	-	-	-	-	-	-	-

Table C-2.--Continued

Taxa		Station Numbers																	
		17			[illegible]			19			4			41			42		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Class Oligochaeta																			
Aeolosomatidae																			
Aeolosoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Haplotaxidae																			
Haplotaxis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Lumbriculidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
Lumbriculus	I	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	38.[illegible]	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	57.3	-	-	-	-	-	-	-	-	-
Kincaidiana	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Eclipidrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Naididae	I	-	-	19.1	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	76.4
	II	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	19.1	-	-	-
	III	-	-	-	-	-	-	19.1	-	-	-	-	-	19.1	-	-	-	-	-
Tubificidae																			
Aulodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bothrioneurum	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	38.2
	II	-	-	-	-	-	-	-	57.3	171.9	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	76.4	114.6	-	-	-	-	-	-	-	-	-
Branchiura	I	57.3	-	-	267.6	76.4	38.2	-	-	95.5	57.3	-	[illegible]	-	-	-	19.1	-	76.4
	II	-	-	496.5	-	-	-	-	-	191.0	-	-	-	-	-	-		-	171.9
	III	-	152.8	191.0	-	-	-	-	-	152.8	-	-	-	-	-	-	-	-	152.8
Limnodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Peloscolex	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubifex	I	57.3	171.9	38.2	38.2	38.2	-	19.1	57.3	38.[illegible]	152.8	38.2	35.2	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	19.1	38.2	-	-	-	-	-	191.0	-	-	114.6
	III	-	-	-	-	-	-	19.1	-	57.3	-	-	-	-	-	-	-	-	-
Lumbriculidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Tubificidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	57.3	-	-	-	-	-	-	-	-	-	-	-	-	267.4	-	515.7
	III	-	19.1	38.2	-	-	-	-	-	-	-	-	-	-	-	-	191.0	95.5	382.0
Class Hirudinea	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Glossiphoniidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Hirudidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Erpobdellidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-2.--Continued

Taxa		Station Numbers 43			44			45			46		
		L	M	R	L	M	R	L	M	R	L	M	R
Class Oligochaeta													
Aeolosomatidae													
Aeolosoma	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Haplotaxidae													
Haplotaxis	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Lumbriculidae													
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	286.5	-	-	-	-	-	-	-	-	-
	III	-	19.1	229.2	-	-	-	-	-	-	-	-	-
Lumbriculus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Kincaidiana	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	76.4	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Eclipidrilus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	95.5	-	-	-	-
Naididae	I	-	-	-	-	-	-	-	-	-	38.2	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Tubificidae													
Aulodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Bothrioneurum	I	-	-	19.1	-	-	-	76.9	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Branchiura	I	57.3	-	19.1	-	-	-	38.2	-	-	-	-	-
	II	133.7	-	-	-	-	-	-	-	-	-	-	-
	III	133.7	-	-	-	-	-	-	-	-	-	-	-
Limnodrilus	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	19.1	-
	III	-	-	-	-	-	-	-	-	-	-	19.1	-
Peloscolex	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Tubifex	I	-	38.2	210.1	-	-	19.1	-	-	534.8	95.5	-	-
	II	-	95.5	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Lumbriculidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Tubificidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	133.7	-	-	-	-	19.1	19.1	19.1	-	-	-	-
	III	95.5	38.2	-	19.1	19.1	19.1	19.1	19.1	-	-	-	-
Class Hirudinea	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Glossiphoniidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Hirudidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Erpobdellidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-

Table C-3.-- Mollusks (n/m^2) collected in Ponar samples from the Alabama River.

Taxa		Station 1			Station 2			Station 3			Station 4			Station 5			Station 6		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Class Gastropoda																			
Viviparidae																			
Campeloma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	19.1	-	-	-	19.1	19.1	-	-	38.2	-
Physidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pleuroceridae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gyrotoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Goniobasis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Planorbidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bulimidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Gastropoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Class Pelecypoda																			
Cyrenidae																			
Corbicula	I	-	-	248.3	114.6	76.4	133.7	248.3	420.2	458.4	57.3	-	-	38.2	95.5	630.3	19.1	114.6	267.4
	II	19.1	1528.0	286.5	133.7	477.5	114.6	38.2	267.4	955.0	19.1	38.2	19.1	248.3	1967.3	286.5	19.1	305.6	57.3
	III	19.1	1069.6	57.3	57.3	764.0	401.1	38.2	76.4	286.5	57.3	-	76.4	38.2	114.6	19.1	114.6	439.3	-
Sphaeriidae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	57.3	-	19.1	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Unionidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Pelecypoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

L=left bank sample looking downstream
M=mid-stream sample
R=right bank sample looking downstream

I=August 9-25, 1977, samples
II=September 19-October 4, 1977, samples
III=October 31-November 17, 1977, samples
"-"=not encountered in collection

NOTE: Due to a computation error, benthic concentrations for August were underestimated. To obtain the correct concentration, multiply August values by 2.25.

Table C-3.--Continued

Taxa		Station Numbers 7			8			9			10			11			12		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Class Gastropoda																			
Viviparidae																			
Campeloma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	19.1	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-
Physidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pleuroceridae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gyrotoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-
Goniobasis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Planorbidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bulimidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Gastropoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Class Pelecypoda																			
Cyrenidae																			
Corbicula	I	76.4	114.6	19.1	191.0	152.8	19.1	324	38.2	76.4	611.2	935.9	229.2	2368.4	420.2	19.1	114.6	-	38.2
	II	286.5	267.4	229.2	191.0	840.4	152.8	-	1069.6	19.1	152.8	324.7	19.1	-	802.2	95.5	152.8	1069.6	95.5
	III	-	-	-	-	152.8	38.2	610.3	324.7	76.4	76.4	783.1	-	171.9	458.4	286.5	57.3	401.1	19.1
Sphaeriidae																			
Eupera	I	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Unionidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Adontinae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Pelecypoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-3.--Continued

Taxa		Station Numbers 13			14			15			16			17			18		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Class Gastropoda																			
Viviparidae																			
Campeloma	I	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
Physidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pleuroceridae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gyrotoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Goniobasis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Planorbidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-
Bulimidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Gastropoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Class Pelecypoda																			
Cyrenidae																			
Corbicula	I	[illegible]	[illegible]	[illegible]	420.2	133.7	[illegible]	305.6	171.9	57.3	324.7	57.3	210.1	19.1	401.1	210.1	19.1	[illegible]	-
	II	[illegible]	382.0	305.6	19.1	76.4	[illegible]	114.6	191.0	955.0	114.6	114.8	152.8	-	496.6	19.1	458.4	191.0	-
	III	19.1	-	57.3	-	-	38.2	19.1	38.2	114.6	57.3	76.4	859.5	229.2	76.4	382.0	95.5	45.5	-
Sphaeriidae																			
Eupera	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Unionidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Adontinae																			
Species A	I	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Pelecypoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-3.--Continued

Taxa		Station Numbers																	
		19			20			21			22			23			24		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Class Gastropoda																			
Viviparidae																			
Campeloma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Physidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pleuroceridae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gyrotoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Goniobasis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-
Planorbidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bulimidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Gastropoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Class Pelecypoda																			
Cyrenidae																			
Corbicula	I	-	-	95.5	57.3	114.6	19.1	229.2	267.4	114.6	152.8	-	76.4	267.4	783.1	-	76.4	802.2	1375.2
	II	133.7	248.1	764.0	95.5	191.0	38.2	114.6	343.8	324.7	-	38.2	-	152.8	229.2	76.4	515.7	783.1	-
	III	19.1	57.3	19.1	19.1	-	19.1	76.4	114.1	-	38.2	-	-	19.1	-	57.3	-	362.9	76.4
Sphaeriidae																			
Eupera	I	-	-	-	-	-	-	-	-	-	19.1	-	19.1	-	-	-	-	-	-
	II	-	-	-	-	38.2	-	-	-	57.3	19.1	-	-	-	-	-	19.1		
	III	-	-	-	-	-	-	-		-	-	-	-	-	-	-	-	-	-
Unionidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Adoretinae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Pelecypoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-3.--Continued

Taxa		25 L	25 M	25 R	26 L	26 M	26 R	27 L	27 M	27 R	28 L	28 M	28 R	29 L	29 M	29 R	30 L	30 M	30 R
Class Gastropoda																			
Viviparidae																			
Campeloma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
	II	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	19.1	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Physidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pleuroceridae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gyrotoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Goniobasis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Planorbidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bulimidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Gastropoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Class Pelecypoda																			
Cyrenidae																			
Corbicula	I	420.2	3132.4	649.4	305.6	477.5	477.5	416.8	439.1	668.5	343.8	191.0	114.6	210.1	401.1	324.7	343.8	248.3	95.5
	II	191.0	324.7	95.5	1279.7	477.5	477.5	-	1508.9	[illegible]	191.0	171.9	133.7	38.2	267.4	19.1	76.4	152.8	95.5
	III	420.2	38.2	19.1	95.5	57.3	-	-	171.9	191.0	76.4	57.3	171.9	38.2	1451.6	38.2	57.3	95.5	95.5
Sphaeriidae																			
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Unionidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Anodontinae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Pelecypoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-3.--Continued

Taxa		31 L	31 M	31 R	32 L	32 M	32 R	33 L	33 M	33 R	[illegible] L	[illegible] M	[illegible] R	[illegible] L	[illegible] M	[illegible] R	[illegible] L	[illegible] M	[illegible] R
Class Gastropoda																			
Viviparidae																			
Campeloma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ph[illegible]idae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pleur[illegible]ceridae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	19.1	-	-	19.1	-	-	-	-	-	-	-	19.1	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Gyrotoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Goniobasis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Planorbidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bulimidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Gastropoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Class Pelecypoda																			
Cyrenidae																			
Corbicula	I	248.3	706.7	95.5	229.2	229.2	38.2	439.3	515.7	[illegible]	343.8	553.9	1031.4	2120.1	38.2	2139.2	19.1	343.8	553.9
	II	133.7	95.5	248.3	725.8	286.5	19.1	515.7	210.1	57.3	668.5	[illegible]	2158.3	57.3	1069.6	1012.3	878.6	[illegible]	[illegible]
	III	57.3	171.9	191.0	38.2	611.2	382.0	95.5	248.3	19.1	229.2	439.3	916.8	19.1	-	95.5	-	-	-
Sphaeriidae																			
Eupera	I	-	-	-	-	-	-	-	-	-	-	-	-	19.1	38.2	-	-	-	-
	II	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Unionidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Adontinae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Pelecypoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-3.--Continued

Taxa		Station Numbers																	
Class Gastropoda		[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
Viviparidae																			
Campeloma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	[illegible]
Physidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pleuroceridae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
[illegible]	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Planorbidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bulimidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Gastropoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Class Pelecypoda																			
Cyrenidae																			
Corbicula	I	515.[illegible]	[illegible]	152.8	362.9	[illegible]	[illegible]	[illegible]	2002.6	-	[illegible]	832.2	515.7	38.2	19.1	[illegible]	[illegible]	[illegible]	[illegible]
	II	19.1	[illegible]	305.6	-	5157.0		19.1	955.0	133.7	-	859.5	[illegible]	-	-	19.1	[illegible]	[illegible]	
	III	171.9	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	114.6	229.2	-	-	191.0	19.1	38.2	-	[illegible]	[illegible]	[illegible]	[illegible]
Sphaeriidae																			
Eupera	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Unionidae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	[illegible]	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Adontinae																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Other Pelecypoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-3.--Continued

Taxa		Station Numbers											
		L	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]	[illegible]
Class Gastropoda													
Viviparidae													
Campeloma	I	-	-	-	-			-	-	-	-	-	-
	II	-	-	-		-		-	-	-	-	-	-
	III	-	-	-	-	-		-	-	-	-	-	-
Physidae													
Species A	I	-	-	-	-	-	-		-	-	-	-	-
	II	-	-	-	-	-			-	-	-	-	-
	III	-	-		-		-		-	-	-	-	-
Pleuroceridae													
Species A	I	-	-	-	-	-	-		-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Gyrotoma	I	-	-	-	-	-			-	-	-	-	-
	II	-	-	-	-	-	-		-	-	-	-	-
	III	-	-	-	-	-			-	-	-	-	-
Goniobasis	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Planorbidae													
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Bulimidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Other Gastropoda	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Class Pelecypoda													
Cyrenidae													
Corbicula	I	248.3	171.9	439.3	229.2	229.2	38.2	1279.7	401.1	324.7	38.2	191.0	210.1
	II	19.1	-	19.1	-	-	38.2	19.1	38.2	19.1	19.1	-	-
	III	38.2	133.7	38.2	-	38.2	-	38.2	38.2	-	-	57.3	19.1
Sphaeriidae													
Eupera	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Unionidae													
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Anodontinae													
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Other Pelecypoda	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-

Table C-4.-- Miscellaneous benthic macroinvertebrates (n/m^2) collected in Ponar samples from the Alabama River.

Taxa		Station Numbers 1			2			3			4			5			6		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Phylum Arthropoda																			
Order Cladocera																			
Sididae																			
Latonopsis	I	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae																			
Bosmina	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	19.1	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
Sididae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	57.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Acari	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	19.1	-	-	57.3	-	-	-	-	38.2
Order Araneae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Cyclopoida																			
Cyclopoididae																			
Cyclops	I	-	-	-	-	-	-	-	57.3	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-
Eucyclops	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	133.7	-	-	-	-	-
Phylum Coelenterata																			
Hydridae																			
Hydra	I	-	57.3	-	19.1	191.0	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	95.5	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	19.1	-	-
Phylum Nematomorpha																			
Gordiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	38.2	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-
Phylum Platyhelminthes																			
Order Tricladida																			
Planariidae																			
Dugesia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	19.1	114.6	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	57.3	-
Planaria	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nemertea																			
Prostoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	19.1	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-

L=left bank sample looking downstream
M=mid-stream sample
R=right bank sample looking downstream

I=August 9-25, 1977, samples
II=September 19-October 4, 1977, samples
III=October 31-November 17, 1977, samples
"-"=not encountered in collection

NOTE: Due to a computation error, benthic concentrations for August were underestimated. To obtain the correct concentration, multiply August values by 2.25.

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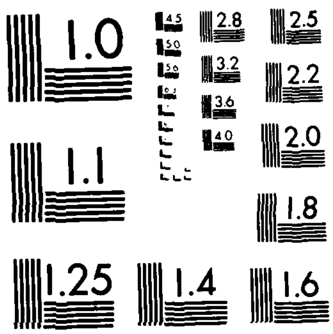
5/5

UNCLASSIFIED F/G 13/2 NL



MICROCOPY RESOLUTION TEST CHART
NATIONAL BUREAU OF STANDARDS 1963 A

Table C-4.--Continued

Taxa		7 L	7 M	7 R	8 L	8 M	8 R	9 L	9 M	9 R	10 L	10 M	10 R	11 L	11 M	11 R	12 L	12 M	12 R
Phylum Arthropoda																			
Order Cladocera																			
Sididae																			
Latonopsis	I	-	-	-	-	-	-	-	95.5	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae																			
Bosmina	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sididae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Acari	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	19.1	-	-	19.1	-	57.3	19.1	-	19.1
Order Araneae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Cyclopoida																			
Cyclopoididae																			
Cyclops	I	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-
Eucyclops	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Coelenterata																			
Hydridae																			
Hydra	I	-	-	-	-	-	-	-	-	-	-	-	-	95.5	-	-	-	-	-
	II	-	38.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	57.3	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematomorpha																			
Gordiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	19.1	38.2	-	-	19.1	-	-
	III	19.1	-	19.1	19.1	-	19.1	-	-	-	-	-	-	19.1	-	19.1	19.1	-	19.1
Phylum Platyhelminthes																			
Order Tricladida																			
Planariidae																			
Dugesia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	38.2	-	-	19.1	-	-	-	-	-	-	-	-	-
Planaria	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nemertea																			
Prostoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	57.3	-	95.5	-	-	-	-	-	-	-	-	-	19.1	-	-

Table C-4.--Continued

Taxa		Station Numbers 13			14			15			16			17			18		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Phylum Arthropoda																			
Order Cladocera																			
Sididae																			
Latonopsis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae																			
Bosmina	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-
Sididae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Acari	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	19.1	38.2	38.2	19.1	19.1	-	-	19.1	-	-	38.2	19.1	-	-	-
Order Araneae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Cyclopoida																			
Cyclopoididae																			
Cyclops	I	-	-	-	-	38.2	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
Eucyclops	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Coelenterata																			
Hydridae																			
Hydra	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-
Phylum Nematomorpha																			
Gordiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Platyhelminthes																			
Order Tricladida																			
Planariidae																			
Dugesia	I	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Planaria	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nemertea																			
Prostoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-

*No sample taken of site 13--midstream.

Table C-4.--Continued

Taxa		Station Numbers 19 L	19 M	19 R	20 L	20 M	20 R	21 L	21 M	21 R	22 L	22 M	22 R	23 L	23 M	23 R	24 L	24 M	24 R
Phylum Arthropoda																			
Order Cladocera																			
Sididae																			
Latonopsis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae																			
Bosmina	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sididae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Acari	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-
Order Araneae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Cyclopoida																			
Cyclopoidae																			
Cyclops	I	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Eucyclops	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Coelenterata																			
Hydridae																			
Hydra	I	-	-	-	-	1069.6	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-
Phylum Nematoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-
Phylum Nematomorpha																			
Gordiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	38.2	-	-	-	-	-	-	-	-	-	19.1	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Platyhelminthes																			
Order Tricladida																			
Planariidae																			
Dugesia	I	-	-	-	-	57.3	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	19.1	-	-	-
	III	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
Planaria	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nemertea																			
Prostoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-

Table C-4.--Continued

Taxa		25 L	25 M	25 R	26 L	26 M	26 R	27 L	27 M	27 R	28 L	28 M	28 R	29 L	29 M	29 R	30 L	30 M	30 R
Phylum Arthropoda																			
Order Cladocera																			
Sididae																			
Latenopsis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae																			
Bosmina	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sididae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Acari	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	57.3	-
	II	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	19.1	-	-	-
Order Araneae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	19.1	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Cyclopoida																			
Cyclopoididae																			
Cyclops	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	19.1	-	-	-
Eucyclops	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Coelenterata																			
Hydridae																			
Hydra	I	-	-	-	38.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematomorpha																			
Gordiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	19.1	-	-	-	-	19.1	-	-	-	38.2	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Platyhelminthes																			
Order Tricladida																			
Planariidae																			
Dugesia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Planaria	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nemertea																			
Prostoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-4.--Continued

Taxa		Station Numbers 31			32			33			34			35			36		
		L	M	R	L	M	R	L	M	R	L	M	R	L	M	R	L	M	R
Phylum Arthropoda																			
Order Cladocera																			
Sididae																			
__Latonopsis__	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae																			
__Bosmina__	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sididae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Acari	I	-	-	-	19.1	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	76.4	-	-	57.3	267.4	-	-	-	-	-	-	-	-	-	-	-
Order Araneae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Cyclopoida																			
Cyclopoidae																			
__Cyclops__	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-
__Eucyclops__	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Coelenterata																			
Hydridae																			
__Hydra__	I	-	-	-	-	-	-	-	-	-	-	-	-	-	76.4	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematoda	I	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematomorpha																			
Gordiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	38.2	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Platyhelminthes																			
Order Tricladida																			
Planariidae																			
__Dugesia__	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-	-
__Planaria__	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nemertea																			
__Prostoma__	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-4.--Continued

Taxa		37 L	37 M	37 R	38 L	38 M	38 R	39 L	39 M	39 R	40 L	40 M	40 R	41 L	41 M	41 R	42 L	42 M	42 R
Phylum Arthropoda																			
Order Cladocera																			
Sididae																			
Latonopsis	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae																			
Bosmina	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Sididae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Order Acari	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-	19.1
	III	95.5	-	-	-	-	-	152.8	-	-	57.3	-	38.2	-	19.1	-	-	-	-
Order Araneae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	-	-	-	-
Order Cyclopoida																			
Cyclopoididae																			
Cyclops	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Eucyclops	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Coelenterata																			
Hydridae																			
Hydra	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematoda	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-
Phylum Nematomorpha																			
Gordiidae	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	38.2	-	-	-	-	-	19.1	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Platyhelminthes																			
Order Tricladida																			
Planariidae																			
Dugesia	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Planaria	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nemertea																			
Prostoma	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-4.--Continued

Taxa		Station Numbers 43 L	43 M	43 R	44 L	44 M	44 R	[illegible] L	[illegible] M	[illegible] R	[illegible] L	[illegible] M	[illegible] R
Phylum Arthropoda													
Order Cladocera													
Sididae													
Latonopsis	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae													
Bosmina	I	-	19.1	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Sididae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Bosminidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Order Acari	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	30.2	30.2	-	19.1	-	-	-	-	-	-
Order Araneae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Order Cyclopoida													
Cyclopoididae													
Cyclops	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Eucyclops	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Coelenterata													
Hydridae													
Hydra	I	-	-	-	-	-	-	-	19.1	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematoda	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nematomorpha													
Gordiidae	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Platyhelminthes													
Order Tricladida													
Planariidae													
Dugesia	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Planaria	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Nemertea													
Prostoma	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-

Table C-4.--Continued

Taxa		Station Numbers 1 L	1 M	1 R	2 L	2 M	2 R	3 L	3 M	3 R	4 L	4 M	4 R	5 L	5 M	5 R	6 L	6 M	6 R
Phylum Entoprocta Urnatellidae <u>Urnatella</u>	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	955.0	114.6	-	152.8	-	-	19.1	-	-	-	-	-	57.3	-	-	-	-
	III	19.1	-	-	-	-	-	-	-	-	-	-	382.0	534.8	-	229.2	1432.5	-	-
Phylum Ectoprocta Gymnolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Paludicellidae <u>Pottsiella</u>	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	57.3	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	38.2	-	-	1337.0	-	2674.0	382.0	-	-
<u>Paludicella</u>	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	305.6	-	-	-	-	-
Phylactolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cristatellidae <u>Pulmatella</u>	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
<u>Pectinatella</u>	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ectoprocta Species A	I	-	57.3	-	-	-	-	-	95.5	-	-	-	-	-	19.1	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	95.5	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Taxa		7 L	7 M	7 R	8 L	8 M	8 R	9 L	9 M	9 R	10 L	10 M	10 R	11 L	11 M	11 R	12 L	12 M	12 R
Phylum Entoprocta Urnatellidae <u>Urnatella</u>	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	687.6	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Ectoprocta Gymnolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Paludicellidae <u>Pottsiella</u>	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	305.6	-	-	-	-	-	229.2	-	-	-	-	-	362.9	-	-
	III	-	-	-	38.2	-	-	-	-	-	-	-	38.2	-	-	-	324.7	-	-
<u>Paludicella</u>	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylactolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cristatellidae <u>Pulmatella</u>	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
<u>Pectinatella</u>	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ectoprocta Species A	I	19.1	19.1	95.5	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	57.3	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	477.5	-	-	-

Table C-4.--Continued

Taxa | **Station Numbers**

Taxa		13 L	13 M	13 R	14 L	14 M	14 R	15 L	15 M	15 R	16 L	16 M	16 R	17 L	17 M	17 R	18 L	18 M	18 R
Phylum Entoprocta Urnatellidae *Urnatella*	I	-	-		-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	19.1	19.1	-	-	-	-	-	-	5462.6	-	477.5
	III	-	-	-	-	-	-	-	-	229.2	-	-	-	-	-	19.1	477.5	7693.1	-
Phylum Ectoprocta Gymnolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Paludicellidae *Pottsiella*	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	1241.5	-	-	-	-	-	-	-	592.1	1833.6	57.3	19.1	-	515.7	-	133.7	324.7
	III	-	-	706.7	-	76.6	-	-	133.7	7429.9	19.1	152.8	210.1	-	-	1956.6	-	-	-
Paludicella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylactolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cristatellidae *Pulmatella*	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pectinatella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	19.1	-	-	-	-	19.1	-	-	-	-	152.8	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	38.2	-	-	
Ectoprocta Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	57.6	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Taxa		19 L	19 M	19 R	20 L	20 M	20 R	21 L	21 M	21 R	22 L	22 M	22 R	23 L	23 M	23 R	24 L	24 M	24 R
Phylum Entoprocta Urnatellidae *Urnatella*	I	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	19.1	-
	II	-	1337.0	-	-	133.7	-	-	-	-	191.0	-	-	-	-	-	-	-	-
	III	-	-	-	20974.7	-	-	-	-	-	-	-	-						
Phylum Ectoprocta Gymnolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Paludicellidae *Pottsiella*	I	-	-	-	-	-	-	-	-	-	-	-	-	324.7	-	133.7	-	-	-
	II	-	-	-	1290.8	19.1	-	-	-	-	3657.1	76.6	-	-	-	-	-	-	-
	III	-	-	19.1	955.5	-	19.1	-	-	-	-	-	-						
Paludicella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylactolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cristatellidae *Pulmatella*	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	116.6	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pectinatella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	133.7	-	-	116.6	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ectoprocta Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	19.1	-	-	-	19.1	-
	II	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-4.--Continued

Taxa		Station Numbers 25 L	25 M	25 R	26 L	26 M	26 R	27 L	27 M	27 R	28 L	28 M	28 R	29 L	29 M	29 R	30 L	30 M	30 R
Phylum Entoprocta																			
Urnatellidae																			
Urnatella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	2307.5	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Ectoprocta																			
Gymnolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Paludicellidae																			
Pottsiella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	76.4	133.7	-	-	-	-	286.5	-	-	-	-	-	-	-	-	-
	III	4087.6	-	-	-	-	420.2	-	-	-	-	1566.2	19.1	-	-	-	-	-	-
Paludicella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylactolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cristatellidae																			
Plumatella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pectinatella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ectoprocta																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Taxa		31 L	31 M	31 R	32 L	32 M	32 R	33 L	33 M	33 R	34 L	34 M	34 R	35 L	35 M	35 R	36 L	36 M	36 R
Phylum Entoprocta																			
Urnatellidae																			
Urnatella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	95.5	-	-
	II	19.1	-	-	19.1	-	-	382.0	-	38.2	-	-	38.2	-	19.1	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	133.7	-	-	-	-	-	-	-
Phylum Ectoprocta																			
Gymnolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Paludicellidae																			
Pottsiella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	133.7	-	-	878.6	-	-	-	19.1	76.4	-	-	267.6	-	-	76.4	-	-	-
	III	649.4	19.1	-	-	-	-	-	-	840.6	-	-	-	-	-	-	-	-	-
Paludicella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylactolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Cristatellidae																			
Plumatella	I	-	-	-	19.1	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pectinatella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	38.2	-	-	-	-	229.2	-	-	-	-	-	-	-	-	-	-	-	-
Ectoprocta																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Table C-4.--Continued

Taxa		Station Numbers 37 L	37 M	37 R	38 L	38 M	38 R	39 L	39 M	39 R	40 L	40 M	40 R	41 L	41 M	41 R	42 L	42 M	42 R
Phylum Entoprocta																			
Urnatellidae																			
Urnatella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	38.2	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Ectoprocta																			
Gymnolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Paludicellidae																			
Pottsiella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-
	III	-	-	-	-	-	-	-	-	-	-	-	-	382.0	-	-	-		-
Paludicella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-
Phylactolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-
Cristatellidae																			
Plumatella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-		-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Pectinatella	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Ectoprocta																			
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-	-

Taxa		43 L	43 M	43 R	44 L	44 M	44 R	45 L	45 M	45 R	46 L	46 M	46 R
Phylum Entoprocta													
Urnatellidae													
Urnatella	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Phylum Ectoprocta													
Gymnolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Paludicellidae													
Pottsiella	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Paludicella	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Phylactolaemata	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Cristatellidae													
Plumatella	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Pectinatella	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Ectoprocta													
Species A	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-
Species B	I	-	-	-	-	-	-	-	-	-	-	-	-
	II	-	-	-	-	-	-	-	-	-	-	-	-
	III	-	-	-	-	-	-	-	-	-	-	-	-

Table C-5.--Shannow-Weaver diversity indices calculated from three mathematically composited samples collected at each of 46 Alabama River stations.

Station number	I	II	III
1	2.0192	2.4783	2.7230
2	1.6644	3.0270	1.5345
3	2.0390	2.5954	1.6236
4	1.1555	3.0140	1.8411
5	1.7275	2.5182	1.9589
6	1.5369	2.9655	2.3936
7	0.7753	2.8946	1.7215
8	1.9404	2.2092	2.2074
9	2.0693	2.6387	2.2475
10	1.5587	2.6158	2.2095
11	1.9129	1.8926	2.3324
12	0.8805	2.4256	2.1077
13	0.6309	3.1045	2.2826
14	1.5964	3.2484	2.0782
15	2.3379	2.5795	1.5974
16	2.2847	2.8005	2.8269
17	1.7888	2.0492	2.5484
18	1.0763	1.3425	0.7349
19	1.5589	1.5650	2.2842
20	2.2791	2.8432	0.3931
231	1.9524	2.6540	2.3836
22	2.3363	1.3998	2.4194
23	1.2443	3.4598	1.6946
24	1.5917	2.3674	1.2844
25	1.6251	3.3592	2.4442
26	1.8130	2.3810	1.9257
27	1.4455	2.4007	2.1723
28	2.8978	2.8082	2.1938
29	1.8855	3.2812	2.2912
30	2.4212	2.7910	2.3738

I=August 9-25, 1977, samples
II=September 19 through October 4, 1977, samples
III=October 31 through November 17, 1977, samples

Table C-5.--Continued

Station number	I	II	III
31	1.9548	3.1492	2.8713
32	2.7853	1.9651	2.4946
33	1.2755	3.1936	2.6340
34	1.4500	2.6306	1.9436
35	0.9788	3.2508	1.6122
36	2.2857	2.4955	1.3710
37	1.7786	1.5117	2.4789
38	1.9388	0.5442	0.7412
39	1.3595	2.2670	2.5378
40	1.5072	2.0995	1.9079
41	1.1378	1.3771	2.1210
42	1.7760	2.0072	1.8664
43	2.0476	2.9216	2.3343
44	0.7538	1.8676	2.5570
45	1.6492	2.7842	2.0382
46	2.1761	2.0000	2.0382

Table C-6.--Benthic biomass data (grams/m^2) calculated from three mathematically composited samples collected at each of 46 Alabama River stations.

Station number	I	II	III
1	1.3	.6	5.4
2	2.3	.1	5.7
3	2.9	.6	1.6
4	1.3	.6	.6
5	39.4	5.1	.6
6	2.3	.6	3.2
7	399.6	157.9	.1
8	366.7	2076.0	.6
9	2857.5	1785.0	.6
10	2907.0	958.2	3.8
11	7413.7	318.3	732.2
12	482.9	2101.0	445.7
13	1312.2	764.0	859.5
14	4.3	159.2	70.0
15	386.8	986.8	70.6
16	573.1	1.9	178.9
17	945.5	1990.0	578.7
18	44.3	509.3	16.6
19	1.3	.1	.6
20	2.3	1.9	.6
21	4.3	5.7	.6
22	1.3	2.6	10.8
23	34.4	2.6	.6
24	5.6	312.1	.6
25	10.1	259.8	63.0
26	8.5	207.6	62.4
27	7.2	286.5	543.7
28	227.7	827.7	180.8
29	245.0	19.7	1.0
30	101.7	372.5	85.0

I=August 9-25, 1977, samples
II=September 19 through October 4, 1977, samples
III=October 31 through November 17, 1977, samples

Table C-6.--Continued

Station number	I	II	III
31	621.7	159.8	136.9
32	1.3	255.3	62.4
33	593.1	210.1	154.1
34	233.5	514.4	252.8
35	34.4	11.5	.6
36	153.2	291.6	.1
37	91.8	187.6	35.0
38	83.0	31.8	116.5
39	478.6	210.1	220.8
40	128.9	114.6	13.4
41	4.3	.6	198.6
42	73.3	350.2	15.3
43	567.2	.6	71.9
44	42.3	.6	5.1
45	24.3	1.9	1.3
46	24.3	.6	7.0

Table C-7.-- Taxa found on modified Dendy multiplate samplers collected from the Alabama River.

Taxa		Station Numbers 1	3	4	5	6	7
Caenidae	I	L	L		L	L	L
	II	L	L	L	L		
Hexageniidae	I			X			
	II					X	X
Ceratopogonidae	I			X			
	II						
Chironomidae*	I			X			
	II					X	X
Culicidae	I			X			
	II						
Simuliidae	I						
	II						
Psychomyiidae	I						
	II						
Hydroptilidae	I						
	II						X
Anisoptera	I						
	II						
Zygoptera	I						
	II						
Cladocera	I			X			
	II					X	
Acarina	I						
	II						
Bryozoa	I						
	II						
Hydra	I						
	II						

I=September 19-October 4, 1977, samples II=October 31-November 17, 1977, samples

L indicates samplers were lost sometime during the sampling period and, therefore, were not retrieved.

X indicates presence of organisms.

*Chironomidae were the dominant organisms at each station during both runs.

Table C-7.- Continued

Taxa		Station Numbers					
		8	9	10	11	13	14
Caenidae	I	L	L	L	X	X	X
	II		L		L	X	X
Hexageniidae	I						
	II	X		X			
Ceratopogonidae	I						
	II	X				X	[illegible]
Chironomidae	I				X	X	X
	II	X		X		X	X
Culicidae	I						
	II						X
Simuliidae	I						
	II			X			
Psychomyiidae	I				X		
	II						
Hydroptilidae	I						
	II						
Anisoptera	I						
	II						
Zygoptera	I						
	II						
Cladocera	I					X	X
	II						X
Acarina	I						X
	II						
Bryozoa	I						X
	II						
Hydra	I						X
	II	X					X

Table C-7.--Continued

Taxa		Station Numbers 15	16	17	19	21	23
Caenidae	I		X		L	X	X
	II		X	L	L	L	L
Hexageniidae	I			X			
	II						
Ceratopogonidae	I						
	II		X				
Chironomidae	I	X	X	X		X	X
	II	X	X				
Culicidae	I						
	II	X	X				
Simuliidae	I						
	II						
Psychomyiidae	I						
	II						
Hydroptilidae	I		X	X		X	
	II	X					
Anisoptera	I						X
	II						
Zygoptera	I	X					
	II	X					
Cladocera	I		X				
	II						
Acarina	I						
	II						
Bryozoa	I						
	II						
Hydra	I						
	II						

Table C-7.- Continued

Taxa		Station Numbers					
		24	26	28	30	31	32
Caenidae	I	L	X	L		L	
	II			L		X	X
Hexageniidae	I						
	II						
Ceratopogonidae	I						
	II	X			X	X	X
Chironomidae	I		X		X		X
	II	X	X		X	X	X
Culicidae	I						
	II		X			X	X
Simuliidae	I		X				
	II		X				
Psychomyiidae	I				X		X
	II				X		
Hydroptilidae	I		X		X		X
	II		X		X	X	
Anisoptera	I						
	II	X					
Zygoptera	I		X				
	II						
Cladocera	I						
	II	X		X			
Acarina	I						
	II						
Bryozoa	I						
	II	X					
Hydra	I						
	II	X					

Table C-7.--Continued

Taxa		Station Numbers					
		33	34	36	38	41	42
Caenidae	I			X	L		L
	II	X	L	L	L	X	L
Hexageniidae	I						
	II						
Ceratopogonidae	I						
	II					X	
Chironomidae	I	X	X	X		X	
	II	X				X	
Culicidae	I			X			
	II					X	
Simuliidae	I						
	II						
Psychomyiidae	I	X	X			X	
	II						
Hydroptilidae	I	X	X	X		X	
	II						
Anisoptera	I						
	II	X				X	
Zygoptera	I			X			
	II						
Cladocera	I						
	II						
Acarina	I						
	II						
Bryozoa	I						
	II						
Hydra	I			X			
	II						

Table C-7.--Continued

Taxa		Station Numbers 43	44	45	46
Caenidae	I	L	L	L	L
	II	X	X		
Hexageniidae	I				
	II				
Ceratopogonidae	I				
	II	X	X	X	X
Chironomidae	I				
	II	X	X	X	X
Culicidae	I				
	II				
Simuliidae	I				
	II				
Psychomyiidae	I				
	II				
Hydroptilidae	I				
	II	X	X		X
Anisoptera	I				
	II				
Zygoptera	I				
	II				
Cladocera	I				
	II			X	
Acarina	I				
	II				
Bryozoa	I				
	II				
Hydra	I				
	II			X	

APPENDIX D

Macrophyte Data

Table D-1.-- Macrophyte sampling stations on the Alabama River

Site	River Mile	Bank*
1	72.9	W
2	73.1	E
3	75.7	W
4	75-9	W
5	77.0	E
6	77.9	W
7	77.9	E
8	78.8	W
9	82.1	W
10	83.8	E
11	83.8	W
12	84.6	E
13	84.7	W
14	85.0	W
15	86.7	E
16	88.0	W
17	88.2	E
18	89.1	E
19	90.1	E
20	90.6	E
21	92.9	E
22	95.0	E
23	95.0	W
24	97.7	E
25	97.7	W
26	100.0	W
27	100.1	E
28	101.0	E
29	103.0	W
30	106.1	E
31	107.2	E
32	108.0	W
33	109.8	W
34	111.7	W
35	112.9	E

*E = east bank of river looking downstream
W = west bank of river looking downstream

Table D-1.--Continued

Site	River Mile	Bank
36	115.5	E
37	116.3	W
38	117.3	E
39	119.5	W
40	120.5	E
41	122.0	E
42	122.9	W
43	123.6	E
44	124.5	E
45	124.5	W
46	127.1	W
47	128.0	W
48	129.9	E
49	130.5	W
50	131.2	E
51	133.8	W
52	133.9	W
53	134.1	E
54	134.2	E
55	134.6	E
56	134.8	E
57	136.2	E
58	136.5	E
59	136.6	W
60	137.0	E
61	137.5	E
62	137.6	W
63	138.0	E
64	138.4	W
65	139.2	E
66	139.2	W
67	140.1	E
68	140.3	W
69	141.1	E
70	141.2	W

Table D-1.--Continued

Site	River Mile	Bank
71	142.3	E
72	143.9	E
73	144.2	E
74	145.0	E
75	145.4	W
76	146.1	W
77	146.2	E
78	147.0	E
79	147.0	W
80	147.5	E
81	149.0	E
82	150.4	E
83	150.5	W
84	151.0	E
85	152.0	W
86	152.2	E
87	152.5	W
88	153.7	E
89	153.7	W
90	153.9	W
91	155.3	E
92	156.9	W
93	157.8	W
94	157.9	E
95	158.2	W
96	158.8	E
97	159.1	E
98	160.0	W
99	160.6	E
100	161.0	E
101	161.0	W
102	161.2	E
103	162.1	W
104	162.9	E
105	163.0	W

Table D-1.--Continued

Site	River Mile	Bank
106	163.1	E
107	164.0	W
108	164.1	E
109	164.4	W
110	165.0	E
111	165.5	W
112	166.1	E
113	166.7	E
114	166.9	W
115	167.8	E
116	167.8	W
117	Omitted	
118	168.0	W
119	168.4	E
120	168.7	E
121	168.7	W
122	169.1	W
123	170.5	E
124	171.5	E
125	172.0	E
126	173.0	W
127	173.5	W
128	176.0	E
129	177.2	W
130	177.5	E
131	178.5	W
132	179.3	E
133	180.0	W
134	183.5	E
135	184.6	E
136	185.5	W
137	186.0	W
138	186.0	E
139	187.0	E
140	187.7	W

Table D-1.--Continued

Site	River Mile	Bank
141	188.1	W
142	188.5	W
143	189.0	E
144	190.0	W
145	190.5	E
146	191.0	W
147	191.5	E
148	192.7	W
149	192.9	W
150	193.0	E
151	193.8	W
152	194.2	E
153	194.3	E
154	197.0	W
155	198.0	W
156	200.3	W
157	201.0	W
158	202.1	W
159	203.4	W
160	203.9	W
161	204.5	W
162	207.3	E
163	207.6	W
164	209.0	W
165	210.3	W
166	212.5	W
167	213.0	W
168	217.0	W
169	218.9	E
170	221.5	W
171	222.0	E
172	222.8	W
173	223.7	E
174	225.5	E
175	225.5	W

Table D-1.--Continued

Site	River Mile	Bank
176	226.5	W
177	Omitted	
178	227.5	W
179	228.0	W
180	228.0	E
181	22 .4	W
182	230.0	E
183	231.0	E
184	231.7	W
185	232.0	E
186	232.0	W
187	232.5	W
188	233.0	W
189	233.1	E
190	234.0	W
191	236.0	W
192	237.6	E
193	238.0	E
194	238.7	W
195	239.4	E
196	240.1	E
197	240.2	W
198	240.8	E
199	241.4	E
200	241.4	W
201	242.2	W
202	243.2	E
203	243.2	W
204	243.8	E
205	244.1	E
206	244.5	W
207	244.7	E
208	245.7	E
209	245.8	W
210	246.0	E

Table D-1.--Continued

Site	River Mile	Bank
211	246.2	W
212	247.0	E
213	247.0	W
214	247.3	W
215	247.8	E
216	248.0	E
217	248.0	W
218	248.5	E
219	248.5	W
220	249.2	E
221	250.0	W
222	250.3	E
223	250.7	W
224	250.9	E
225	251.4	E
226	251.8	W
227	252.0	E
228	252.0	W
229	252.4	W
230	253.0	W
231	253.6	E
232	255.5	E
233	255.7	W
234	256.0	E
235	256.0	W
236	256.2	W
237	257.1	W
238	257.4	E
239	258.5	W
240	259.1	W
241	259.3	E
242	259.5	E
243	260.0	E
244	260.1	W
245	260.8	E

Table D-1.--Continued

Site	River Mile	Bank
246	261.1	E
247	261.5	W
248	261.8	E
249	262.0	E
250	262.7	W
251	263.0	E
252	263.3	W
253	263.9	E
254	264.2	E
255	264.5	W
256	264.9	E
257	265.4	E
258	266.2	E
259	266.3	W
260	266.5	E
261	267.8	E
262	268.7	E
263	271.0	W
264	271.5	E
265	273.0	E
266	274.2	W
267	274.5	E
268	274.8	E
269	276.0	E
270	279.0	E
271	280.5	W
272	281.0	E
273	285.0	E
274	285.0	W
275	288.5	W
276	290.5	E
277	297.5	E
278	300.0	W

Table D-2.-- An annotated list of aquatic plants found along the Alabama River*

(E=emergent; Fl=free floating; Fl-lv=free floating, leaved; S=submersed)

TAXODIACEAE

(E) Taxodium distichum (L.) Richard: 9, 38, 45, 50, 58, 102, 109, 110, 135, 144, 158, 169, 173, 181, 182.

TYPHACEAE

(E) Typha latifolia L.: 2, 4, 6-8, 12, 51, 54, 55, 57, 60, 61, 64, 65, 69, 71, 72, 74, 75, 77, 78, 84, 86, 87, 91, 92, 103, 109, 112, 114, 119, 121, 126, 193, 199-201, 213, 214, 217, 230, 242, 248.

SPARGANIACEAE

(E) Sparganium americanum Nuttall: 25.

ALISMATACEAE

(E) Echinodorus cordifolius (L.) Grisebach: 199.

(E) Sagittaria graminea Micheaux: 9.

(E) Sagittaria latifolia Willd.: 1, 5-7, 9, 12, 17, 54-56, 60, 61, 63, 67, 69, 72, 74-80, 82-84, 86, 89, 94-103, 106, 107, 110, 112, 114, 116, 119, 120, 122, 125, 126, 130, 139, 200, 203, 213, 219, 245, 251, 254, 274.

POACEAE

(E) Echinochloa walteri (Pursh) Heller: 6, 10, 15, 31, 39, 42, 45, 65, 72, 75, 77, 91, 97, 100, 115, 122, 146, 150, 152, 214, 246, 248, 268, 271, 274.

(E) Eragrostis sp.: 40, 199, 238, 268.

(E) Erianthus giganteus (Walt.) Muhl.: 61, 67, 82, 96.

(Fl-lv) Hydrochloa caroliniensis Beauvois: 54, 99.

(E) Leersia virginica Willd.: 64, 65, 67, 69, 76, 86, 87, 93, 100, 104, 110, 112, 119, 132, 143, 163, 166.

(E) Panicum dichotomiflorum Michaux: 1, 2, 5-16, 18-32, 34, 35, 39-45, 58, 77, 80, 101, 106, 108, 112, 119, 128, 132, 145, 158, 163.

(E, Fl-lv) Paspalum fluitans (Ell.) Kunth--138, 139, 141, 142, 145, 148, 149, 153, 160, 161, 163, 170, 172. This species developed several large colonies and presumably could become a problem to recreation.

*-Numbers following each species name refer to the macrophyte sampling site number (Table D-1) at which the species was found.

Table D-2.--Continued

CYPERACEAE

(E) *Carex* sp.: 234, 260, 268, 275.

(E) *Cyperus* sp.: 2, 14, 54, 57, 60, 61, 64, 70, 71, 73, 80, 87, 88, 104, 110, 112, 115, 157, 167, 170, 172, 176, 198, 199, 205, 212, 213, 220, 222, 227, 233, 234, 238, 239, 248, 249, 254, 259, 262, 264, 268, 275.

(E) *Eleocharis quadrangulata* (Michx.) R. & S.: 54.

(E) *Eleocharis* sp.: 212, 220, 232-234, 238, 260, 264, 268.

(E) *Fimbristylis miliacea* (L.) Vahl: 55, 115, 172, 199, 212, 220, 222, 231-234, 238, 239, 249, 254, 259-261, 264, 268, 277.

(E) *Rhynchospora corniculata* (Lam.) Gray: 6, 8, 54, 55, 67, 69, 71, 88, 203, 227.

(E) *Scirpus cyperinus* (L.) Kunth: 115, 276.

ARACEAE

(E) *Colocasia esculenta* (L.) Schott: 6, 57, 61, 70. Although there are no large colonies on the river, this species may cause problems with recreation. It has been known to do so in other states.

(E) *Peltandra virginica* (L.) Kunth: 69, 71, 77, 96, 124, 193, 214, 219, 221, 226, 227, 229, 230, 238, 245, 251, 261, 264.

LEMNACEAE

(Fl) *Spirodela polyrrhiza* (L.) Schleid.: 4.

COMMELINACEAE

(E) *Commelina communis* L.: 254.

PONTEDERIACEAE

(Fl) *Eichhornia crassipes* (Martius) Solms: 7, 48, 54, 55, 57-62, 64, 68, 70. This species certainly can cause problems with recreation.

JUNCACEAE

(E) *Juncus effusus* L.: 54, 71, 212.

(E) *Juncus* sp.: 151.

SAURURACEAE

(E) *Saururus cernuus* L.: 96.

Table D-2.--Continued

SALICACEAE

(E) *Populus deltoides* Marshall: 10, 23, 26, 44.

(E) *Salix nigra* Marshall: 14, 19, 21-23, 25, 26, 31-33, 36, 37, 45-50, 60, 76, 78, 80, 169, 176, 178.

JUGLANDACEAE

(E) *Carya aquatica* (Michx. f.) Nuttall: 31, 38, 50, 179, 185.

BETULACEAE

(E) *Alnus serrulata* (Aiton) Willd.: 57, 70.

(E) *Betula nigra* L.: 12.

ULMACEAE

(E) *Planera aquatica* Walter ex. J. F. Gmelin: 25, 29, 41, 45, 46, 48-50, 155, 153, 173, 174, 176, 178, 179, 181, 183, 191.

POLYGONACEAE

(E) *Polygonum hydropiperoides* Michx.: 6, 9, 168, 254.

(E) *Polygonum lapathifolium* L.: 172, 278.

(E) *Polygonum* sp.: 71, 175, 199.

AMARANTHACEAE

(E, Fl-lv) Alternanthera philoxeroides (Martius) Grisebach: 1, 3, 4, 6, 9-11, 48, 51, 53, 55, 57, 60, 61, 63, 65, 67, 68, 70-74, 77-79, 82, 84, 87, 88, 90-94, 96, 97, 99-103, 105-107, 109-111, 113-116, 118, 119, 121-125, 134, 135, 139, 141-144, 157, 175, 176, 179, 181, 184, 186, 187, 189, 190, 192, 193, 195-197, 200-202, 205, 207, 208, 210, 211, 213, 214, 217-219, 228, 232, 236, 237- 241-251, 253, 254, 257, 258, 263-265, 270. This is probably the most abundant species and certainly can cause recreational problems.

NYMPHAEACEAE

(Fl-lv) *Nuphar luteum* (L.) Sibthorp & Smith: 209, 210, 213, 251, 266.

NELUMBONACEAE

(Fl-lv) *Nelumbo pentapetala* (Walt.) Fern.: 57, 60.

BRASSICACEAE

(E) *Rorippa palustris* (L.) Besser: 151, 170, 171, 239, 261.

Table D-2.--Continued

CRASSULACEAE

(E) Penthorum sedoides L.: 142, 172.

PLATANACEAE

(E) Platanus occidentalis L.: 21, 39, 47, 48.

FABACEAE

(E) Daubentonia punicea (Cav.) DC.: 71.
(E) Sesbania exaltata (Raf.) Rydberg ex A. W. Hill: 2, 9, 12, 67, 69, 74.

ACERACEAE

(E) Acer rubrum L.: 12, 39, 46, 48-50.

MALVACEAE

(E) Hibiscus militaris Cav.: 6, 54, 79, 86, 88, 112, 146, 184, 203, 213, 257, 261, 273, 275, 276.

HYPERICACEAE

(E) Hypericum virginicum L.: 1, 6, 54, 55, 57, 70-72, 200.

LYTHRACEAE

(E) Ammannia coccinea Rottboell: 8, 25, 54, 60, 63, 69, 72, 78, 115, 142, 145, 146, 151, 154, 156, 159, 162, 163, 165, 167, 170, 172, 176, 197-200, 209, 212, 220, 231-234, 238, 239, 248, 249, 251, 254, 260, 261, 264, 277.
(E) Rotala ramosior (L.) Koehne: 155, 156, 166, 167, 199, 200, 209, 232, 239, 248, 254, 262, 264, 265, 277.

ONAGRACEAE

(E) Ludwigia alternifolia L.: 48, 110.
(E) Ludwigia leptocarpa (Nuttall) Hara: 57, 60, 64, 70, 92, 110, 232, 233, 238, 248.
(E) Ludwigia decurrens Walter: 9, 72, 78, 86, 119, 155, 158, 172, 199, 231.
(E, Fl-lv) Ludwigia peploides var. glabrescens (Kuntze) Shinners: 1, 2, 5, 6, 9, 10, 40, 57, 60, 61, 65, 69, 71, 73, 78, 84, 87, 88, 94, 99, 111, 112, 132, 136, 138, 139, 142, 144-148, 155, 162, 193, 195, 197, 199, 200, 203, 205, 209, 213, 219, 230, 233, 238, 246, 249, 251-254, 258, 262, 268, 277. This species can cause recreational problems.

ONAGRACEAE (cont'd)

(E, Fl-lv) Ludwigia palustris (L.) Ell.: 12, 71, 81, 132, 143, 145, 164, 166, 172, 199, 203, 212, 220, 222, 227, [illegible], 248, 254, 260, 261, 264, 265, 268, 277, 278.

(E) Ludwigia sp.: 6, 8, 12, 14, 58, 144. 145, 156, 167, 176, 196, 216, 220, 222, 236, 246, 249, 260, 264, 265, 277.

HALORAGACEAE

(S) Myriophyllum spicatum L.: 53-55, 57, 58, 60, 61, 63, 65, 67, 71. This species has become very abundant in the north and has completely covered many lakes. This process is just beginning in the south and probably will get worse.

APIACEAE

(Fl-lv) Hydrocotyle ranunculoides L. f.: 57,61.

(E) Hydrocotyle verticillata Thunberg: 131, 261.

OLEACEAE

(E) Fraxinus sp.: 35.

CONVOLVULACEAE

(E) Ipomoea sp.: 71.

HYDROPHYLLACEAE

(E) Hydrolea quadrivalvis Walter: 2, 4, 5, 8, 15, 197, 199, 200, 220, 227, 232, 239, 249, 264, 277.

BORAGINACEAE

(E) Heliotropium sp.: 48.

VERBENACEAE

(E) Lippia lanceolata Michaux: 6, 10, 152.

LAMIACEAE

(E) Lycopus sp.: 54, 55, 57, 58, 70, 71, 142, 144, 175.

SCROPHULARIACEAE

(E) Bacopa rotundifolia (Michx.) Wettst.: 99, 199, 216, 234, 239, 249, 260, 268.

(E) Gratiola virginiana L.: 60, 72, 81, 93, 151, 152, 154, 156, 163, 165, 170-172, 176, 199, 200, 205, 207, 209, 212, 213, 216, 220, 227, 231-233, 238, 239, 249, 251, 254, 259-262, 265, 268, 274, 276-278.

(E) Micranthemum umbrosum (Walt.) Blake: 172, 176, 212, 239, 260, 261.

Table D-2.--Continued

ACANTHACEAE

(E, Fl-lv) Justicia americana (L.) Vahl: 3, 52, 54, 56-58, 60, 63-68, 70-73, 75-77, 79-84, 86, 88, 89, 91, 92, 94-99, 101, 104-106, 108-110, 112, 114-116, 119, 120, 122-127, 129, 130, 139-142, 156, 158, 176, 180, 185, 191, 193-195, 198, 204, 206, 209, 211, 215, 216, 219, 221-225, 227, 229, 231-233, 235-238, 240, 245, 247, 251, 255, 256, 259, 262, 267, 271, 272. This species can cause recreational problems.

RUBIACEAE

(E) Cephalanthus occidentalis L.: 77, 257.

CAMPANULACEAE

(E) Sphenoclea zeylanica Gaertn.: 9, 69, 92, 93.

ASTERACEAE

(E) Bidens sp.: 57, 58.

(E) Eclipta alba (L.) Hassk.: 132, 142-146, 149, 151, 154-156, 164, 165, 168, 170-172, 199, 207, 209, 212, 213, 219, 220, 222, 227, 230, 232, 233, 236, 238, 248, 254, 258-264, 267, 268, 274-277.

(E) Mikania scandens (L.) Willd.: 137.

(E) Pluchea camphorata (L.) DC.: 2, 5-8, 11, 15, 18-20, 27, 42, 154, 157, 167, 170, 171, 175, 199, 205, 207, 232, 239, 249, 260, 268, 278.

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